



# Soils & Engineering Services, Inc.

April 7, 2021

Project 508.02 R03

Mr. Charlie Loudon, RA, LEED AP BD+C, DBIA  
Burns & McDonnell  
9400 Ward Parkway  
Kansas City, Missouri 64114

Subject: Environmental Exploration Report  
F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
Hoffman Street  
City of Madison  
Dane County, Wisconsin

Dear Mr. Loudon:

We have completed the requested environmental exploration consisting of the performance of five borings at the subject site and the associated chemical laboratory testing. The purpose of these borings was to obtain information about the soil, bedrock, and groundwater conditions at the boring locations. We present our findings and analyses results in the enclosed *Environmental Exploration Report* for the subject project. Engineering analysis of the chemical analyses results was not included in our scope of services for this work.

Respectfully submitted,

**SOILS & ENGINEERING SERVICES, INC.**

A handwritten signature in black ink that reads "Craig M. Bower".

Craig M. Bower, P.E.

CMB:DER:cmb

Enclosure

Delivered by email: [cloudon@burnsmcd.com](mailto:cloudon@burnsmcd.com)

# **ENVIRONMENTAL EXPLORATION REPORT**

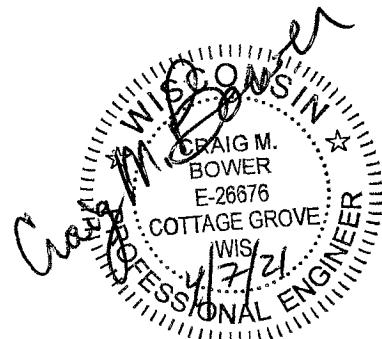
**F-35: ADAL B510 WAREHOUSE & SUPPLY  
TRUAX AIR NATIONAL GUARD BASE  
HOFFMAN STREET  
CITY OF MADISON  
DANE COUNTY, WISCONSIN**

SES Project Number 508.02

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Mr. Charlie Loudon, RA, LEED AP BD+C, DBIA

April 7, 2021



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- Notes and Legend Record for WDNR Boring Log Information Forms
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- WDNR Well/Drillhole/Borehole Abandonment Forms for Borings E-510-1, E-510-1X, and E-510-2 through E-510-4

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- CT Laboratories, LLC Analytical Report dated March 8, 2021.
- VISTA Analytical Laboratory Analytical Report dated March 5, 2021.

#### Appendix C

- *Important Information about This Geoenvironmental Report* advisory



## I. INTRODUCTION

This *Environmental Exploration Report* summarizes the findings of the environmental exploration, and the related laboratory and field tests performed for the design and construction of an addition to the Warehouse & Supply Building B510 of the Truax Air National Guard Base (ANGB) located in the City of Madison, in Dane County, Wisconsin. We understand that this work is for the Wisconsin Air National Guard 115th Fighter Wing stationed at the Truax ANGB. We completed this work under the general direction of Burns & McDonnell, who established the general scope of the work.

The intent of this report is to: (1) convey the environmental information obtained from the five borings and (2) present the results of laboratory and field tests. Engineering analysis of the chemical analyses results was not included our current scope of work for this project.

## II. PROJECT INFORMATION

The project consists of the design and construction of an addition to the Warehouse & Supply Building B510 of the Truax Air National Guard Base (ANGB). The Truax ANGB is located on the north side of the City of Madison in Dane County, Wisconsin.

The addition will be located on the east side of the existing warehouse building and will have a plan area of approximately 5,150 square feet ( $\text{ft}^2$ ). No other information regarding this addition was provided. We anticipate the addition will have a concrete slab-on-grade floor and will be support on a frost-depth spread footing foundation.

We understand the environmental exploration was requested to meet requirements specified by the State of Wisconsin Department of Natural Resources (WDNR) to determine if environmental contamination is present at the location of the proposed addition to Warehouse & Supply Building B510, specifically as it related to the proposed site excavations. WDNR prepared a document entitled *Site Characterization Sampling For Contaminated Material Management Purposes ADAL B510* dated May 28, 2020. This document specified testing soil and water samples for volatile organic compounds (VOCs) and perfluoroalkyl and polyfluoroalkyl compounds (PFAS). This document provided the following scope of the field work.

- Four borings within the proposed addition area. The relative locations of the borings were provided in the WDNR document.
- Collect two discrete soil samples from each boring at depths of 1 to 2 feet below ground surface and at one foot above the water table and test for VOCs and PFAS.
- Collect and test one groundwater sample from each boring and test for VOCs and PFAS.



### **III. ENVIRONMENTAL EXPLORATION**

The field exploration for the subject structure improvements consisted of the performance of five standard borings, (designated Borings E-510-1, E-510-1X, and E-510-2 through E-510-4), at the project site. Due to insufficient recovered soil sample volume at Boring E-510-1, we performed Boring E-510-1X in close proximity to Boring E-510-1.

We present the results of this environmental field exploration on the WDNR Boring Log Information Forms enclosed in Appendix A. The WDNR Boring Log Information Forms present the subsurface stratigraphy and related information obtained by the borings. We provide information pertinent to the WDNR Boring Log Information Forms on the Notes and Legend Record enclosed in Appendix A.

#### **A. Boring Locations**

We located Borings E-510-1, E-510-1X, and E-510-2 through E-510-4 in the vicinity of the requested locations as indicated on the Location Sketches, Drawings 508.02-2A and 508.02-2B, enclosed in Appendix A. We coordinated with 2<sup>nd</sup> Lt. Cory R. Corson, Wisconsin Air National Guard, for the placement of the boring locations to minimize disruption to the base operations and to avoid underground utility lines. Per Lt. Corson, the borings were located on either side of the existing service drive present in the proposed construction area.

#### **B. Boring Elevations**

Soils & Engineering Services, Inc. personnel determined the ground surface elevation at the locations of Borings E-510-1, E-510-1X, and E-510-2 through E-510-4 using a surveying level and a leveling rod. We used the rim of the storm sewer inlet located in the driveway entrance approximately 75 feet east of the northeast corner of the existing B510 building for a benchmark. The benchmark has a given elevation of 862.22 feet per the drawings provided to us. We indicate the benchmark location on enclosed Drawing 508.02-3B.

We include the ground surface elevations for the borings on the WDNR Boring Log Information Forms enclosed in Appendix A. The WDNR Boring Log Information Forms are plotted with a depth scale for reference.

#### **C. Drilling and Sampling Procedures**

We drilled and sampled Borings E-510-1, E-510-1X, and E-510-2 through E-510-4 to the following depths below ground surface and corresponding elevations:



Boring	Ground Surface Elevation (feet)	Bottom of Boring	
		Depth (feet-inch)	Elevation (feet)
E-510-1	864.9	16'-0"	848.9
E-510-1X	864.9	12'-0"	852.9
E-510-2	864.9	16'-0"	848.9
E-510-3	863.1	16'-0"	847.1
E-510-4	863.8	16'-0"	847.8

We used a Geoprobe 7822DT drill rig mounted on a rubber-tracked carrier to complete the borings. We used a dual-tube direct push sampler to maintain an open borehole as we advanced the borehole of each boring to the termination depth. We obtained soil samples at 4-foot intervals starting at the ground surface and continued to the stated termination depth. We visually identified the recovered soils in general compliance with the Unified Soil Classification System (USCS) identification procedures as defined in ASTM Designation D2488.

After reaching the termination depth at each boring and removing the inner-tube of the sampler, we installed ¾-inch-diameter polyvinyl chloride (PVC) casing and screen inside of the outer Geoprobe casing at each borehole. We then removed the outer casing to expose the PVC screen to the subsurface water. The PVC casing and screen was manufactured by Monoflex and each section of PVC was factory sealed in plastic sheeting. We then used a Geopump peristaltic pump to obtain a groundwater sample from each borehole using high density polyethylene tubing inserted into each of the temporary wells. We disposed of the tubing following the water sample collection from each boring.

We used reagent-grade water and Alconox to decontaminate the soil sampling tooling, followed by a triple rinse with reagent-grade water. We performed this environmental sampling at the same time as work performed for the B409 and B426 projects. Please refer to those reports for rinsate water sample 'Field Blank' testing for VOCs.

We pumped the reagent-grade water through the peristaltic pump for testing for VOCs. We identified this sample as 'Pump Blank.'

In addition to the pump blank, we submitted a sample of reagent-grade water for testing for VOCs. We identified this sample as 'Trip Blank.'

Please refer to the WDNR Boring Log Information Forms enclosed in Appendix A for additional information regarding the sampling of Borings E-510-1, E-510-1X, and E-510-2 through E-510-4.



#### D. Subsurface Stratigraphy

The soil stratigraphy encountered at Borings E-510-1, E-510-1X, and E-510-2 through E-510-4 consisted of fill material and topsoil overlying native soil strata. None of the borings encountered bedrock below the native soil strata within the depths drilled.

The borings encountered variable fill material and topsoil strata. We describe the fill material and topsoil strata encountered at the borings as follows:

- Borings E-510-1 and E-510-1X encountered 11 inches of very dark brown LEAN CLAY (CL) FILL TOPSOIL over 31 inches of very dark grayish-brown and yellowish-brown fine POORLY-GRADED SAND WITH SILT (SP-SM) FILL.
- Boring E-510-2 encountered 11 inches of black LEAN CLAY (CL) FILL TOPSOIL over 13 inches of brown fine SILTY SAND WITH GRAVEL (SM) FILL over 12 inches of light yellowish-brown fine POORLY-GRADED SAND WITH SILT (SP-SM) FILL.
- Borings E-510-3 and E-510-4 encountered 9 and 13 inches, respectively, of very dark brown or very dark grayish-brown LEAN CLAY (CL) FILL TOPSOIL.

Below the fill material and topsoil, Borings E-510-1, E-510-1X, and E-510-2 through E-510-4 encountered a native soil strata that was variable. We describe the native soil strata encountered at the borings as follows:

- Borings E-510-1 and E-510-1X encountered brown LEAN CLAY (CL) over dark yellowish-brown fine CLAYEY SAND (SC) with trace gravel over pale brown to brown fine SILTY SAND (SM).
- Boring E-510-2 encountered brown fine SILTY SAND (SM) with trace gravel over brown fine POORLY-GRADED SAND WITH SILT (SP-SM).
- Boring E-510-3 encountered brown LEAN CLAY (CL) over dark yellowish-brown to light yellowish-brown to brown fine POORLY-GRADED SAND WITH SILT (SP-SM).
- Boring E-510-4 encountered brown and dark yellowish-brown SANDY LEAN CLAY (CL) with CLAYEY SAND (SC) seams over dark yellowish-brown fine SILTY SAND (SM) over very pale brown to brown fine POORLY-GRADED SAND WITH SILT (SP-SM).

We noted that the POORLY-GRADED SAND WITH SILT (SP-SM) stratum contained a variable amount of gravel from trace to little and also contained occasional fine to medium and fine to coarse seams.



Please refer to the WDNR Boring Log Information Forms enclosed in Appendix A for a further description of the fill material and native soil strata encountered at the boring locations.

#### E. Subsurface Water

Our drilling crew found the boreholes of the borings to be in the following states:

- Boring E-510-1X was dry at the termination depth at completion of the drilling and sampling of this boring.
- Borings E-510-1, E-510-2, E-510-3, and E-510-4 were caved and wet at completion of the sampling of these borings. Our drilling crew obtained a water level through the temporary well screen before obtaining the water samples at each of these borings.

We summarize the water and caved level depths and respective elevations at completion for each boring as follows:

Boring	Ground Surface Elevation (feet)	Subsurface Water			Caved Level		
		Depth (feet-inch)	Elevation (feet)	Comments	Depth (feet-inch)	Elevation (feet)	Comments
E-510-1	864.9	12'-8"	852.2	Through temporary well screen before water sampling	—	—	—
		—	—	—	13'-0"	851.9	Wet at completion
E-510-2	864.9	13'-4"	851.5	Through temporary well screen before water sampling	—	—	—
		—	—	—	13'-4"	851.5	Wet at completion
E-510-3	863.1	11'-9"	851.4	Through temporary well screen before water sampling	—	—	—
		—	—	—	11'-9"	851.4	Wet at completion
E-510-4	863.8	12'-4"	851.4	Through temporary well screen before water sampling	—	—	—
		—	—	—	12'-4"	851.4	Wet at completion

We expect the subsurface water (groundwater) level to fluctuate as influenced by precipitation, snowmelt, surface water runoff, and other hydrological and hydrogeological factors. The groundwater level at the time of construction of the building improvements may be higher or lower than the groundwater levels encountered on the day that we performed the borings.



#### IV. CHEMICAL LABORATORY TESTS

We submitted two soil samples and one groundwater sample from each boring for laboratory analyses to CT Laboratories, LLC (CTL). CTL subcontracted with VISTA Analytical Laboratory for the PFAS testing. The requested laboratory analyses consisted of Volatile Organic Compounds (EPA Method 8260C) and Perfluoroalkyl and Polyfluoroalkyl (PFAS Isotope Dilution Method) for both sample matrices. After obtaining the samples, we shipped all of the samples to CTL. CTL then shipped the samples to VISTA.

We provide the following information regarding the soil and groundwater samples obtained from each of the borings:

Boring	Matrix	Sample Number	Approximate Sample Depth (feet)	SES Sample Identification	Samples Obtained	Laboratory Received	
						CTL	VISTA
E-510-1	Soil	1	2	E510-1,S1,2'	2/1/2021	2/3/2021	2/5/2021
	Water	—	—	E510-1			
	Dup	—	—	E510-1 Dup			
E-510-1X	Soil	3	10	E510-1,S3,10'	2/1/2021	2/3/2021	2/5/2021
		Dup	—	E510-1,Dup			
E-510-2	Soil	1	2	E510-2,S1,2'	2/1/2021	2/3/2021	2/5/2021
		3	9 1/2	E510-2,S3,9 1/2'			
	Water	—	—	E510-2			
E-510-3	Soil	1	2	E510-3,S1,2'	2/1/2021	2/3/2021	2/5/2021
		3	9 1/2	E510-3,S3,9 1/2'			
	Water	—	—	E510-3			
E-510-4	Soil	1	2	E510-4,S1,2'	2/2/2021	2/3/2021	2/5/2021
		3	10	E510-4,S3,10'			
	Water	—	—	E510-4			

Dup = Duplicate

We present a summary of the results of those analytes detected in at least one sample for each sample matrix in Tables 1 and 2 on pages 7 through 11. A copy of the Analytical Reports from CT Laboratories, LLC and VISTA Analytical Laboratory are included in Appendix B. The analytical reports from these laboratories include the chain of custodies for the samples submitted to them.

An environmental engineering analysis of the laboratory test results is not a part of our scope of work.



Table 1: Summary of the chemical analyses results of individual soil samples.

Analyte †	SES Sample Identification		
	E510-1,S1,2'	E510-1,S3,10'	E510-1, DUP
<i>Physical analyses. Results in %.</i>			
Solids Content	86.5	91.6	85.7
Moisture Content	13.5	8.4	14.3
<i>Volatile Organic Compounds (VOC) analyses. Results in mg/kg.</i>			
No compounds detected above the method detection limits.			
<i>Perfluoroalkyl and Polyfluoroalkyl (PFAs) analyses. Results in ng/g.</i>			
Perfluorobutanoic acid (PFBA)	<0.254	<0.263	<0.260
Perfluorohexanesulfonic acid (PFHxS)	<0.445> Q	<0.403	<0.400
Perfluorooctanesulfonic acid (PFOS)	<0.729	<0.755	<0.748

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- † = Only compounds detected in at least one sample are listed. All other compounds in the analysis scan list were not detected above the Limit of Detection.  
 < = Values with less than sign (<) indicate a compound that was not detected above the Limit of Detection for the sample.  
 <> = Estimated value. Analyte detected at a level less than the Limit of Quantification but greater than or equal to the Limit of Detection.  
 — = No sample submitted for this analysis.  
 Q = The ion transition ratio is outside of the acceptance criteria.



Table 1: Summary of the chemical analyses results of individual soil samples.  
(continued)

Analyte †	SES Sample Identification		
	E510-2,S1,2'	E510-2,S3,10'	E510-3,S1,2'
<i>Physical analyses. Results in %.</i>			
Solids Content	91.7	90.5	84.5
Moisture Content	8.3	9.5	15.5
<i>Volatile Organic Compounds (VOC) analyses. Results in mg/kg.</i>			
No compounds detected above the method detection limits.			
<i>Perfluoroalkyl and Polyfluoroalkyl (PFAs) analyses. Results in ng/g.</i>			
Perfluorobutanoic acid (PFBA)	<0.265	<0.265	<0.259
Perfluorohexanesulfonic acid (PFHxS)	<0.407	<0.407	1.11
Perfluorooctanesulfonic acid (PFOS)	<0.762	<0.762	<0.745

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- † = Only compounds detected in at least one sample are listed. All other compounds in the analysis scan list were not detected above the Limit of Detection.  
 < = Values with less than sign (<) indicate a compound that was not detected above the Limit of Detection for the sample.  
 <> = Estimated value. Analyte detected at a level less than the Limit of Quantification but greater than or equal to the Limit of Detection.  
 — = No sample submitted for this analysis.  
 Q = The ion transition ratio is outside of the acceptance criteria.



Table 1: Summary of the chemical analyses results of individual soil samples.  
(continued)

Analyte †	SES Sample Identification		
	E510-3,S2,9 1/2'	E510-4,S1,2'	E510-4,S3,10'
<i>Physical analyses. Results in %.</i>			
Solids Content	87.7	81.5	97.7
Moisture Content	12.3	18.5	2.3
<i>Volatile Organic Compounds (VOC) analyses. Results in mg/kg.</i>			
No compounds detected above the method detection limits.			
<i>Perfluoroalkyl and Polyfluoroalkyl (PFAs) analyses. Results in ng/g.</i>			
Perfluorobutanoic acid (PFBA)	<0.267	<0.357>	<0.265
Perfluorohexanesulfonic acid (PFHxS)	<0.410	0.646	<0.406
Perfluorooctanesulfonic acid (PFOS)	<0.767	1.18 Q	<0.760

- 
- † = Only compounds detected in at least one sample are listed. All other compounds in the analysis scan list were not detected above the Limit of Detection.
  - < = Values with less than sign (<) indicate a compound that was not detected above the Limit of Detection for the sample.
  - <> = Estimated value. Analyte detected at a level less than the Limit of Quantification but greater than or equal to the Limit of Detection.
  - = No sample submitted for this analysis.
  - Q = The ion transition ratio is outside of the acceptance criteria.



Table 2: Summary of the chemical analyses results of individual groundwater samples.

Analyte †	SES Sample Identification		
	E510-1	E510-1 DUP	E510-2
<i>Volatile Organic Compounds (VOC) analyses. Results in µg/L.</i>			
Dichlorodifluoromethane	<0.40	<0.40	<0.80>
<i>Perfluoroalkyl and Polyfluoroalkyl (PFA) analyses. Results in ng/L.</i>			
Perfluorobutanoic acid (PFBA)	<b>6.74</b>	<b>6.64</b>	<b>4.12</b>
Perfluoropentanoic acid (PFPeA)	<b>6.56</b>	<b>6.16</b>	<1.21>
Perfluorobutanesulfonic acid (PFBS)	<b>3.46</b>	<b>3.66</b>	<b>13.0</b>
Perfluorohexanoic acid (PFHxA)	<b>6.88</b>	<b>6.67</b>	<1.94>
Perfluoropentane sulfonic acid (PFPeS)	<1.81>	<b>2.30</b>	<b>11.4</b>
Perfluoroheptanoic acid (PFHpA)	<b>4.96 Q</b>	<b>5.26</b>	<0.295
Perfluorohexanesulfonic acid (PFHxS)	<b>40.8</b>	<b>45.8</b>	<b>137</b>
Perfluorooctanoic acid (PFOA)	<b>7.39</b>	<b>7.41</b>	<1.05>
Perfluoroheptane sulfonate (PFHpS)	<1.26>	<0.469	<b>12.1</b>
Perfluorononanoic acid (PFNA)	<b>4.85</b>	<b>3.99</b>	<0.404
Perfluorooctanesulfonic acid (PFOS)	<b>87.8</b>	<b>78.4</b>	<b>26.1 Q</b>

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- † = Only compounds detected in at least one sample are listed. All other compounds in the analysis scan list were not detected above the Limit of Detection.  
 < = Values with less than sign (<) indicate a compound that was not detected above the Limit of Detection for the sample.  
 <> = Estimated value. Analyte detected at a level less than the Limit of Quantification but greater than or equal to the Limit of Detection.  
 — = No sample submitted for this analysis.  
 Q = The ion transition ratio is outside of the acceptance criteria.



Table 2: Summary of the chemical analyses results of individual groundwater samples.  
(continued)

Analyte †	SES Sample Identification		
	E510-3	E510-4	
<i>Volatile Organic Compounds (VOC) analyses. Results in µg/L.</i>			
Dichlorodifluoromethane	<0.40	<0.40	
<i>Perfluoroalkyl and Polyfluoroalkyl (PFA) analyses. Results in ng/L.</i>			
Perfluorobutanoic acid (PFBA)	<b>11.9</b>	<b>15.7</b>	
Perfluoropentanoic acid (PFPeA)	<b>16.5</b>	<b>19.8</b>	
Perfluorobutanesulfonic acid (PFBS)	<b>7.61</b>	<b>10.6</b>	
Perfluorohexanoic acid (PFHxA)	<b>13.9</b>	<b>26.2</b>	
Perfluoropentane sulfonic acid (PFPeS)	<b>9.47</b>	<b>10.6</b>	
Perfluoroheptanoic acid (PFHpA)	<b>7.62 Q</b>	<b>24.7</b>	
Perfluorohexanesulfonic acid (PFHxS)	<b>82.9</b>	<b>272</b>	
Perfluorooctanoic acid (PFOA)	<b>7.93</b>	<b>53.9</b>	
Perfluoroheptane sulfonate (PFHpS)	<1.06	<b>5.80</b>	
Perfluorononanoic acid (PFNA)	<b>&lt;1.61&gt;</b>	<b>2.55</b>	
Perfluorooctanesulfonic acid (PFOS)	<b>49.5</b>	<b>48.0</b>	

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- † = Only compounds detected in at least one sample are listed. All other compounds in the analysis scan list were not detected above the Limit of Detection.  
 < = Values with less than sign (<) indicate a compound that was not detected above the Limit of Detection for the sample.  
 <> = Estimated value. Analyte detected at a level less than the Limit of Quantification but greater than or equal to the Limit of Detection.  
 — = No sample submitted for this analysis.  
 Q = The ion transition ratio is outside of the acceptance criteria.



## V. DISCUSSION

### A. Groundwater Samples

#### 1. PFA Analyses Results

The PFAS analyses detected 11 compounds above the method detection limits for the groundwater samples submitted.

The Wisconsin Department of Health Services (DHS) Per- and Polyfluoroalkyl Substances (PFAS) webpage [<https://www.dhs.wisconsin.gov/chemical/pfas.htm>] includes recommended groundwater limits for these substances. This webpage presents the DHS recommended limits for these substances presented to the Wisconsin Department of Natural Resources (WDNR) for use in developing the rules for the protection of public health. Per this webpage, DHS recommended a groundwater enforcement standard of 20 ng/L and a preventative action limit of 2 ng/L for PFOA and PFOS concentrations individually and combined. DHS issued additional enforcement standards and preventive action limits for PFAS compounds in their *Groundwater Standard Recommendations (Cycle 10)* and *Recommended Groundwater Standards (Cycle 11)* publications.<sup>1 & 2</sup>

Per the DHS webpage and publications, the EPA does not have drinking water standards for any PFAS, but does have a health advisory level of 70 ppt for the combined concentrations of PFOA and PFOS.<sup>3</sup>

Following is a summary of the DHS recommended enforcement standards and preventive action limits for the analytes for which the groundwater samples for Warehouse & Supply Building B510 encountered detections. All of the standards and limits provided in this table are in nanograms per liter (ng/L) rather than a combination of micrograms per liter (µg/L) and ng/L as the DHS website table lists the values.

Compound	Recommended DHS Enforcement Standard (ng/L)	Recommended DHS Preventive Action Limit (ng/L)
Perfluorobutanoic acid (PFBA)	10,000	2,000

<sup>1</sup>"Groundwater Standard Recommendations (Cycle 10)." Wisconsin Department of Health Services, 21 June 2019, last revised 17 Nov. 2020, [www.dhs.wisconsin.gov/water/gws-cycle10.htm](https://www.dhs.wisconsin.gov/water/gws-cycle10.htm).

<sup>2</sup>"Recommended Groundwater Standards (Cycle 11)." Wisconsin Department of Health Services, 6 Nov. 2020, last revised 15 Mar. 2021, [www.dhs.wisconsin.gov/water/gws-cycle11.htm](https://www.dhs.wisconsin.gov/water/gws-cycle11.htm).

<sup>3</sup> 1 part per trillion (ppt) = 1 nanograms per liter (ng/L)  
1 part per billion (ppb) = 1 micrograms per liter (µg/L)  
1 part per million (ppm) = 1 milligrams per liter (mg/L)



Compound	Recommended DHS Enforcement Standard (ng/L)	Recommended DHS Preventive Action Limit (ng/L)
Perfluoropentanoic acid (PFPeA)	not listed	not listed
Perfluorobutanesulfonic acid (PFBS)	450,000	90,000
Perfluorohexanoic acid (PFHxA)	150,000	30,000
Perfluoropentane sulfonic acid (PFPeS)	not listed	not listed
Perfluoroheptanoic acid (PFHpA)	not listed	not listed
Perfluorohexanesulfonic acid (PFHxS)	40	4
Perfluorooctanoic acid (PFOA)	20	2
Perfluoroheptane sulfonate (PFHpS)	not listed	not listed
Perfluorononanoic acid (PFNA)	30	3
Perfluorooctanesulfonic acid (PFOS)	20	2
Perfluorooctanoic acid (PFOA) and Perfluorooctanesulfonic acid (PFOS)	20	2

Per the DHS recommended standards and limits and EPA level presented above, the groundwater samples from the following borings had results for the following PFAS analytes that exceed either the recommended enforcement standards, preventative action limits, or health advisory level.

Boring	Test Result (ng/L)	Comment
Perfluorohexanesulfonic acid (PFHxS) Enforcement Standard = 40 ng/L ng/L Preventative Action Limit = 4 ng/L		
E510-1	40.8	Above Enforcement Standard
E510-1 Duplicate	45.8	Above Enforcement Standard
E510-2	137	Above Enforcement Standard
E510-3	82.9	Above Enforcement Standard
E510-4	272	Above Enforcement Standard
Perfluorooctanoic acid (PFOA) Enforcement Standard = 20 ng/L Preventative Action Limit = 2 ng/L		
E510-1	7.39	Above Enforcement Standard
E510-1 Duplicate	7.41	Above Enforcement Standard
E510-3	7.93	Above Enforcement Standard
E510-4	53.9	Above Enforcement Standard



Boring	Test Result (ng/L)	Comment
Perfluorononanoic acid (PFNA) Enforcement Standard = 30 ng/L Preventative Action Limit = 3 ng/L		
E510-1	4.85	Above Preventative Action Limit
E510-1 Duplicate	3.99	Above Preventative Action Limit
Perfluorooctanesulfonic acid (PFOS) Enforcement Standard = 20 ng/L Preventative Action Limit = 2 ng/L		
E510-1	87.8	Above Enforcement Standard
E510-1 Duplicate	78.4	Above Enforcement Standard
E510-2	26.1	Above Enforcement Standard
E510-3	49.5	Above Preventative Action Limit
E510-4	48.0	Above Enforcement Standard
Perfluorooctanoic acid (PFOA) and Perfluorooctanesulfonic acid (PFOS) Enforcement Standard = 20 ng/L Preventative Action Limit = 2 ng/L EPA Health Advisory Level = 70 ppt		
E510-1	95.19	Above Enforcement Standard, Above EPA Health Advisory Level
E510-1 Duplicate	85.81	Above Enforcement Standard, Above EPA Health Advisory Level
E510-2	26.1	Above Preventative Action Limit
E510-3	57.43	Above Enforcement Standard
E510-4	101.9	Above Enforcement Standard, Above EPA Health Advisory Level

## 2. VOC Analyses Results

The VOC analyses did not detect any compounds above the method detection limits for the groundwater samples submitted.

### B. Soil Samples

The VOC analyses did not detect any compounds above the method detection limits for the soil samples submitted. The PFAS analyses detected three compounds above the method detection limits for the soil samples submitted.

WDNR and DHS do not have any set standards or limits for VOCs or PFAS to apply to soil. WDNR requires that soil residual contaminant levels be determined on a site by site basis based on the type of soils present and the usage of the site per Wisconsin



Administrative Code Chapter NR720. Determining soil residual contaminant levels for the VOCs or PFAS is beyond the scope of our work.

We used the Regional Screening Level calculator on the EPA's website [[https://epa-prgs.ornl.gov/cgi-bin/chemicals/csl\\_search](https://epa-prgs.ornl.gov/cgi-bin/chemicals/csl_search)] for soil with a Hazard Quotient of 1.0 and a target risk of  $10^{-6}$  for chronic exposure for a resident to compute the following screening levels for the PFAS components detected in the soil samples obtained from the borings performed. The EPA Health Screening Level obtained by using the screening calculator is provided in milligrams per kilogram (mg/kg) which we converted to nanograms per gram (ng/g) to match the units for the results for the soil samples analyzed.<sup>4</sup>

Compound	EPA Health Screening Level (ng/g)
Perfluorobutanoic acid (PFBA)	Not listed
Perfluorohexanesulfonic acid (PFHxS)	Not listed
Perfluorooctanesulfonic acid (PFOS)	1,260

Per the EPA levels presented above, none of the soil samples had results for the PFBA, PFHxS, or PFOS analytes that exceeded the health advisory level.

## VI. CLOSING COMMENTS

Soils & Engineering Services, Inc. prepared this *Environmental Exploration Report* for the exclusive use of Burns & McDonnell to aid in the design of design and construction of an addition to the Warehouse & Supply Building B510 of the Truax Air National Guard Base located in the City of Madison, Dane County, Wisconsin.

Please read the *Important Information about This Geoenvironmental Report* advisory sheet enclosed in Appendix C which provides comments about how to interpret and use this *Environmental Exploration Report* for the F-35: ADAL B510 Warehouse & Supply Truax Air National Guard Base project.

Soils & Engineering Services, Inc. prepared this report for the subject project in accordance with generally accepted engineering practices at this time. Soils & Engineering Services, Inc. offers no other expressed or implied warranty.

Soils & Engineering Services, Inc. will store the soil samples obtained from the borings performed for this project for a period of 60 calendar days after the date of this report. Please advise us if we should extend this period.

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<sup>4</sup>1 mg/kg = 1,000 ng/g



**Soils & Engineering Services, Inc.** respectfully submits this *Environmental Exploration Report*, dated April 7, 2021, to **Burns & McDonnell**.

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Burns & McDonnell  
F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
April 7, 2021

Project 508.02  
City of Madison  
Dane County, Wisconsin  
Report 03 Page 16



Geotechnical Engineers since 1966

# **APPENDIX A**

## **Appendix A Contents**

- Location Sketches, Drawings 508.02-2A and 508.02-2B
- Notes and Legend Record for WDNR Boring Log Information Forms
- WDNR Boring Log Information Forms for Borings E-510-1, E-510-1X, and E-510-2 through E-510-4
- WDNR Well/Drillhole/Borehole Abandonment Forms for Borings E-510-1, E-510-1X, and E-510-2 through E-510-4

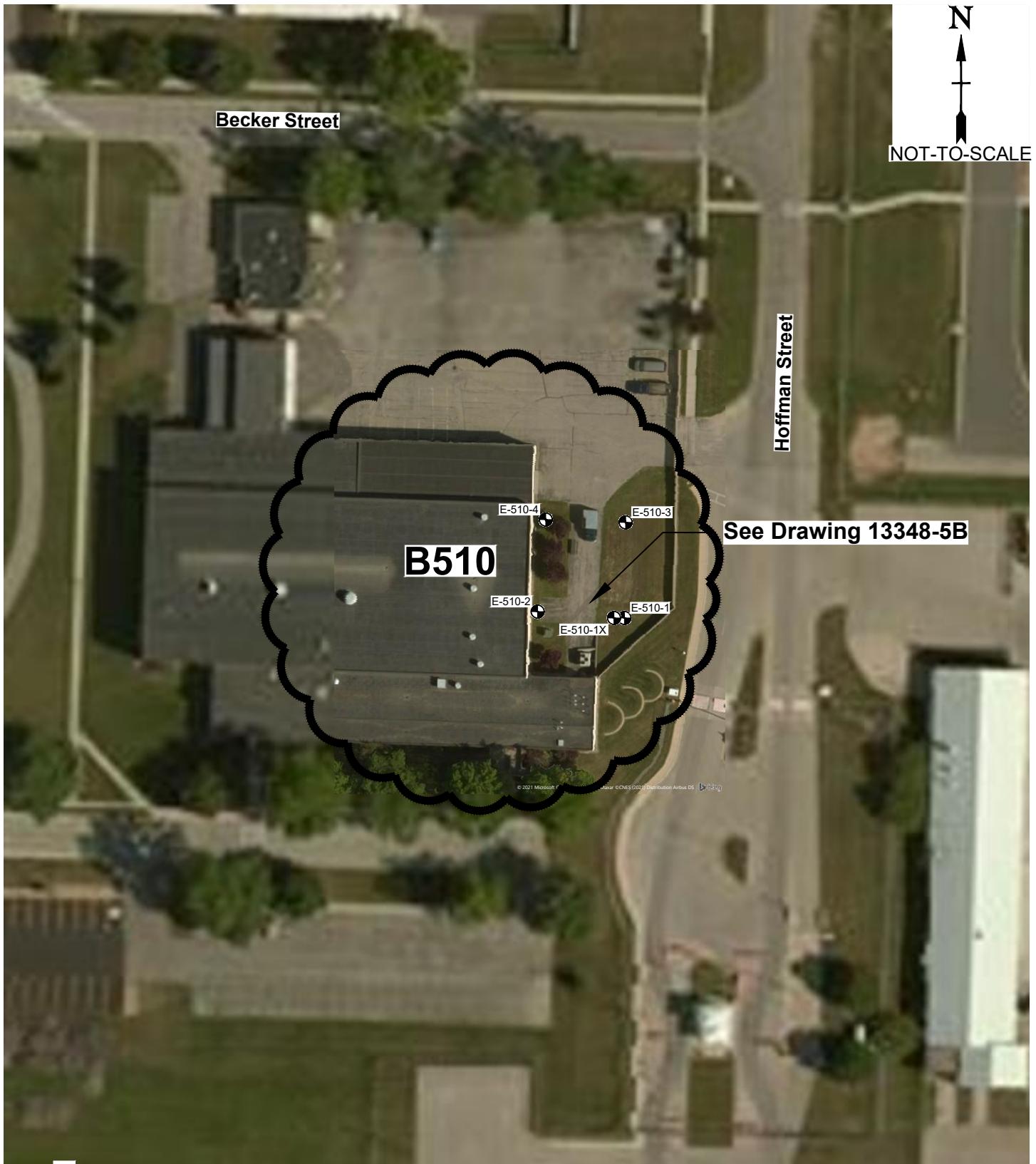
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Burns & McDonnell  
F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
April 7, 2021

Project 508.02  
City of Madison  
Dane County, Wisconsin  
Report 03



Geotechnical Engineers since 1966



 <sup>2</sup> = Boring 2 (typical)



## Soils & Engineering Services, Inc.

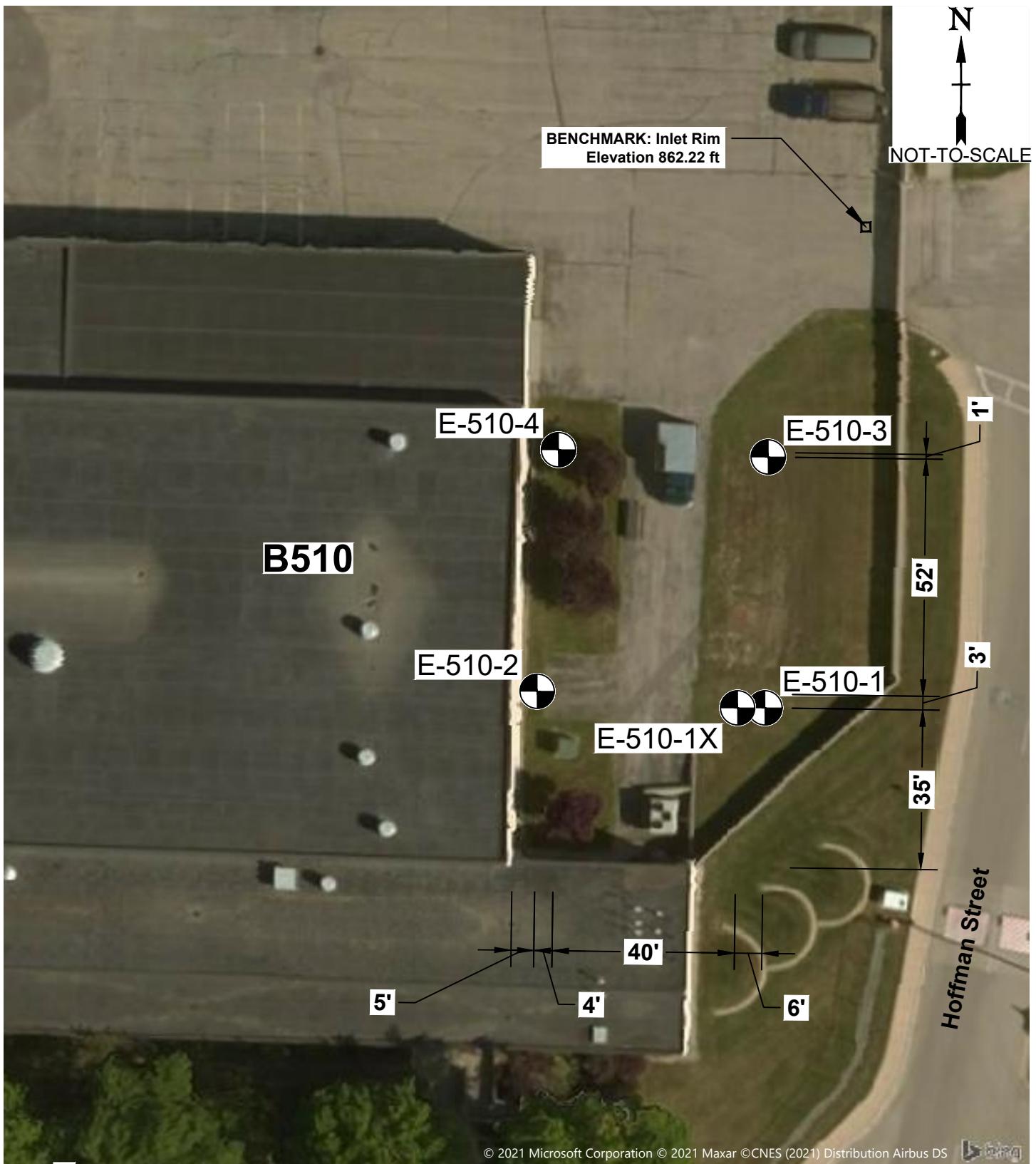
1102 STEWART STREET  
MADISON, WISCONSIN 53713-4648  
Phone: 608-274-7600

CONSULTING CIVIL ENGINEERS SINCE 1966

## LOCATION SKETCH

F-35: ADAL B510 Warehouse and Supply  
Truax Air National Guard Base  
Hoffman Street  
City of Madison, Dane County, Wisconsin  
Project ID XGFG182011

DRAWING  
508.02-3A



<sup>2</sup> = Boring 2 (typical)



## Soils & Engineering Services, Inc.

1102 STEWART STREET  
MADISON, WISCONSIN 53713-4648  
Phone: 608-274-7600

CONSULTING CIVIL ENGINEERS SINCE 1966

## LOCATION SKETCH

F-35: ADAL B510 Warehouse and Supply  
Truax Air National Guard Base  
Hoffman Street  
City of Madison, Dane County, Wisconsin  
Project ID XGFG182011

DRAWING  
508.02-3B

## NOTES

1. The boundary lines between different subsurface strata, as shown on the WDNR Soil Boring Log Information Forms 4400-122 and WDNR Soil Boring Log Information Supplement Forms 4400-122a, are approximate and may be gradual.
2. The boring field log contains a description of the subsurface conditions between samples based on the equipment performance and the cuttings returned to the ground surface. The WDNR Soil Boring Log Information Forms 4400-122 and WDNR Soil Boring Log Information Supplement Forms 4400-122a contains the description of the subsurface conditions as interpreted by a geotechnical engineer and/or a geologist after review of the boring field logs and subsurface samples and/or laboratory test results.
3. We define "Caved Level" as the depth below the existing ground surface at a boring location where material has collapsed into the borehole following removal of the drilling tools.
4. We define "Water Level" as the depth below the existing ground surface at a boring location to the level of water in the open borehole at the time indicated unless otherwise defined on the WDNR Soil Boring Log Information Forms 4400-122 or WDNR Soil Boring Log Information Supplement Forms 4400-122a.
5. We define "at completion" for a boring as being the time when our drilling crew has completed the removal of all drilling tools from the borehole.
6. The Notes and Legend Record and the WDNR Soil Boring Log Information Forms 4400-122 and WDNR Soil Boring Log Information Supplement Forms 4400-122a are a part of the environmental report. The environmental report should be included in the bidding or reference documents.

### **RELATIVE PERCENTAGE TERMS**

(Used in Material Descriptions)

no	0%
trace	<5%
few	5 to <10%
little	10 to <30%
some	30 to <50%

### **SOIL PROPERTIES LEGEND**

Pocket Penetrometer,  $\frac{\text{ton}}{\text{ft}^2}$

Water Content = % moisture by weight

Liquid Limit = % moisture by weight

Plasticity Index = % moisture by weight

P200 = % Passing the No. 200-mesh Sieve

### **RELATIVE MOISTURE TERMS AT TIME OF SAMPLING**

Frozen or F = Frozen material

Dry = Dusty, dry to touch, absence of moisture

Moist or M = Damp to touch, no visible water

Wet or W = Visible free water

### **DRILLING METHODS LEGEND**

DP = Direct push

### **RQD/COMMENTS LEGEND**

PID = Photoionization Detector Reading, equivalent units of isobutylene calibration gas

### **SAMPLER TYPE LEGEND**

 1 3/8-inch-inside-diameter, direct push sampler

## **Soils & Engineering Services, Inc.**

1102 STEWART STREET  
MADISON, WISCONSIN 53713-4648  
Phone: (608) 274-7600

CONSULTING CIVIL ENGINEERS SINCE 1966



### **NOTES AND LEGEND RECORD**

F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
Hoffman Street  
City of Madison, Dane County, Wisconsin  
Project ID XGFG182011

Route To: Watershed/Wastewater  Waste Management   
Remediation/Redevelopment  Other

SES Project Number **508.02**

Page 1 of 2

I hereby certify that the information on this form is true and correct to the best of my knowledge.

Signature		Firm	Soils & Engineering Services, Inc. 1102 Stewart Street Madison, Wisconsin 53713-4648	Tel: (608) 274-7600 Fax: (608) 274-7511
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Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National  
Guard Base, Hoffman Street  
Boring Number E-510-1

SES Project Number **508.02**

Use only as an attachment to Form 4400-122.

Page 2 of 2

Sample	Number and Type	Length Att. & Recovered (in)	Blow Counts	Depth In Feet	Soil/Rock Description And Geologic Origin For Each Major Unit	U S C S	Graphic Log	Well Diagram	PID Readings	Soil Properties				P 200	RQD/Comments
										Pocket	Penetrometer	Moisture Content	Liquid Limit	Plasticity Index	
	X-48	38				SM									(caved) 13'-0" at completion W
				16											
				17											

**NOTE:**

- Set temporary  $\frac{3}{4}$ -inch-diameter PVC well with 5 feet of screen to 16'-0" depth. Used peristaltic pump to purge an approximate rate of 1 liter per 4.6 minutes. Well pumps dry after approximately 500 milliliters. Recharges quickly. Purged approximately 6.5 liters (1.7 gallons) of water in approximately 30 minutes. Then collected water samples from peristaltic pump discharge. First collected PFOS/PFOA sample, then VOC sample, and finally a sample for field testing for the following measurements:

Temperature = 8.9 °C  
Dissolved Oxygen = 7.84 mg/L  
Specific Conductance = 783  $\mu$ S/cm  
pH = 7.53  
Turbidity = 10.73 NTU

- The Notes and Legend Record is considered a part of the WDNR Soil Boring Log Information Form 4400-122 for Boring E-510-1.

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Route To: Watershed/Wastewater  Waste Management   
Remediation/Redevelopment  Other

SES Project Number **508.02**

Page 1 of 1

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National Guard Base, Hoffman Street			License/Permit/Monitoring Number			Boring Number E-510-1X								
Boring Drilled By: Name of crew chief (first, last) and Firm <b>Scott W. Klumb Soils &amp; Engineering Services, Inc.</b>			Date Drilling Started <b>February 1, 2021</b>		Date Drilling Completed <b>February 1, 2021</b>		Drilling Method <b>DP</b>							
WI Unique Well No.		DNR Well ID No.	Common Well Name	Final Static Water Level <b>Dry</b>	Surface Elevation <b>864.9 Feet</b>	Borehole Diameter <b>2.25 in</b>								
Local Grid Origin <input type="checkbox"/> (estimated: <input type="checkbox"/> ) or Boring Location <input type="checkbox"/>			Lat _____		Local Grid Location									
State Plane ft. N, ft. E. S / C / N <u>SW</u> 1/4 of <u>NE</u> 1/4 of Sec. <u>29</u> , T. <u>8</u> N, R. <u>10</u> <u>E</u> W			Long _____	<input type="checkbox"/> N <input type="checkbox"/> E <input type="checkbox"/> S <input type="checkbox"/> W										
Facility ID		County <b>Dane</b>	County Code <b>13</b>	Civil Town/City/ or Village <b>City of Madison/Civil Township of Burke</b>										
Sample		Total Depth = 12'-0"			Soil Properties				RQD/ Comments					
Number and Type	Length Att. & Recovered (in)	Blow Counts	Depth In Feet	Soil/Rock Description And Geologic Origin For Each Major Unit	USCS	Graphic Log	Well Diagram	PLD Readings		Pocket Penetrometer	Moisture Content	Liquid Limit	Plasticity Index	P 200
				<b>LEAN CLAY (CL) — medium plasticity; very dark brown (10YR 2/2); moist; <b>FILL TOPSOIL-[11" thick]</b></b>	CL									
				<b>POORLY-GRADED SAND (SP-SM) — fine grained; non-plastic to low plasticity fines; very dark grayish-brown (10YR 3/2) and yellowish-brown (10YR 5/4); moist; <b>FILL-[31" thick]</b></b>	SP-SM									
				<b>LEAN CLAY (CL) — medium plasticity; brown (10YR 4/3); moist</b>	CL									
				<b>CLAYEY SAND (SC) — fine grained; medium plasticity fines; dark yellowish-brown (10YR 3/4); moist; trace gravel</b>	SC									
				<b>SILTY SAND (SM) — fine grained; non-plastic to low plasticity fines; pale brown (10YR 6/3) to brown (10YR 5/3); moist to wet</b>	SM									
					D									
														M; chemical sample obtained
														D Dry 12'-0" at completion

**NOTE:**

1. The Notes and Legend Record is considered a part of the WDNR Soil Boring Log Information Form 4400-122 and WDNR Soil Boring Log Information Supplement Form 4400-122A for Boring E-510-1X.

I hereby certify that the information on this form is true and correct to the best of my knowledge.

Signature  Firm Soils & Engineering Services, Inc. Tel: {608) 274-7600

1102 Stewart Street Madison, Wisconsin 53713-4648 Fax: (608) 274-7511  
This form is authorized by Chapters 281, 283, 289, 291, 292, 293, 295, and 299, Wis. Stats. Completion of this form is mandatory. Failure to file this form may result in forfeiture of between \$10 and \$25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. NOTE: See instructions for more information, including where the completed form should be sent.

Route To: Watershed/Wastewater  Waste Management   
Remediation/Redevelopment  Other

SES Project Number **508.02**

Page 1 of 2

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National Guard Base, Hoffman Street			License/Permit/Monitoring Number			Boring Number <b>E-510-2</b>		
Boring Drilled By: Name of crew chief (first, last) and Firm <b>Scott W. Klumb Soils &amp; Engineering Services, Inc.</b>			Date Drilling Started <b>February 1, 2021</b>	Date Drilling Completed <b>February 1, 2021</b>	Drilling Method <b>DP</b>			
WI Unique Well No.	DNR Well ID No.	Common Well Name	Final Static Water Level <b>851.5 Feet</b>	Surface Elevation <b>864.9 Feet</b>	Borehole Diameter <b>2.25 in</b>			
Local Grid Origin <input type="checkbox"/> (estimated: <input type="checkbox"/> ) or Boring Location <input type="checkbox"/>			Lat _____			Local Grid Location		
State Plane ft. N, ft. E. S / C / N <u>SW</u> 1/4 of <u>NE</u> 1/4 of Sec. <u>29</u> , T. <u>8</u> N, R. <u>10</u> <u>(E)</u> W			Long _____			<input type="checkbox"/> N <input type="checkbox"/> E Feet <input type="checkbox"/> S <input type="checkbox"/> W		
Facility ID		County Dane	County Code <b>13</b>	Civil Town/City/ or Village <b>City of Madison/Civil Township of Burke</b>				
Sample Number and Type	Total Depth = <b>16'-0"</b> Soil/Rock Description And Geologic Origin For Each Major Unit			Soil Properties				RQD/ Comments
	Length Att. & Recovered (in)	Blow Counts	Depth In Feet	U S C S Graphic Log	Well Diagram	PID Readings Pocket Penetrometer	Moisture Content Liquid Limit	
1	24		<b>CL</b>		0.0			M; chemical sample obtained
	25		<b>SM</b>					M
	28		<b>SP-SM</b>		0.1			M; chemical sample obtained
			<b>SM</b>		0.0			13'-4" through temporary well screen before water sampling

I hereby certify that the information on this form is true and correct to the best of my knowledge.

---

**Signature**

Craig M. Lovett

Firm Soils & Engineering Services, Inc.

1102 Stewart Street Madison, Wisconsin 53713-4648

Tel: (608) 274-7600

Fax: (608) 274-7511

This form is authorized by Chapters 281, 283, 289, 291, 292, 293, 295, and 299, Wis. Stats. Completion of this form is mandatory. Failure to file this form may result in forfeiture of between \$10 and \$25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. NOTE: See instructions for more information, including where the completed form should be sent.

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National  
Guard Base, Hoffman Street  
Boring Number E-510-2

SES Project Number **508.02**

Use only as an attachment to Form 4400-122.

Page 2 of 2

Sample		Blow Counts	Depth In Feet	Soil/Rock Description And Geologic Origin For Each Major Unit	U S C S	Graphic Log	Well Diagram	PID Readings	Soil Properties				P 200	RQD/ Comments
Number and Type	Length Att. & Recovered (in)								Pocket Penetrometer	Moisture Content	Liquid Limit	Plasticity Index		
				blind drilled, 12'-0" to 16'-0"	SP-SM									
			16											
			17											
			18											

**NOTE:**

- Set temporary  $\frac{3}{4}$ -inch-diameter PVC well with 5 feet of screen to 16'-0" depth. Used peristaltic pump to purge an approximate rate of 1 liter per 4.7 minutes. Well pumps dry after approximately 500 milliliters. Recharges quickly. Purged approximately 6.0 liters (1.6 gallons) of water in approximately 30 minutes. Then collected water samples from peristaltic pump discharge. First collected PFOS/PFOA sample, then VOC sample, and finally a sample for field testing for the following measurements:  
 Temperature = 10.0 °C  
 Dissolved Oxygen = 3.09 mg/L  
 Specific Conductance = 760  $\mu$ S/cm  
 pH = 7.13  
 Turbidity = 3.81 NTU

- The Notes and Legend Record is considered a part of the WDNR Soil Boring Log Information Form 4400-122 for Boring E-510-2.

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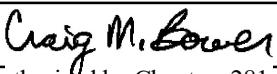
Route To: Watershed/Wastewater   
Remediation/Redevelopment   
Other

SES Project Number **508.02**

Page 1 of 2

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National Guard Base, Hoffman Street			License/Permit/Monitoring Number		Boring Number						
					E-510-3						
Boring Drilled By: Name of crew chief (first, last) and Firm <b>Scott W. Klumb Soils &amp; Engineering Services, Inc.</b>			Date Drilling Started	Date Drilling Completed	Drilling Method						
			February 1, 2021	February 1, 2021	DP						
WI Unique Well No.	DNR Well ID No.	Common Well Name	Final Static Water Level 851.4 Feet	Surface Elevation 863.1 Feet	Borehole Diameter 2.25 in						
Local Grid Origin <input type="checkbox"/> (estimated: <input type="checkbox"/> ) or Boring Location <input type="checkbox"/>			Local Grid Location								
State Plane _____ ft. N, _____ ft. E. S / C / N <u>SW</u> 1/4 of <u>NE</u> 1/4 of Sec. <u>29</u> , T. <u>8</u> N, R. <u>10</u> <u>E</u> /W			Lat _____	_____ N Feet <input type="checkbox"/> S <input type="checkbox"/>	_____ E Feet <input type="checkbox"/> W <input type="checkbox"/>						
Facility ID		County Dane	County Code 13	Civil Town/City/ or Village City of Madison/Civil Township of Burke							
Number and Type and Type	Length Att. & Recovered (in)	Blow Counts	Depth In Feet	Soil Properties				P 200	RQD/ Comments		
				U S C S	Graphic Log	Well Diagram	PID Readings			Pocket Penetrometer	Moisture Content
<b>Total Depth = 16'-0"</b>											
Soil/Rock Description And Geologic Origin For Each Major Unit											
1			1	CL				0.2	2.4, 2.3		M; chemical sample obtained
2			2	CL				0.0			M
3			3	SP-SM				0.0			M; chemical sample obtained
											▼ 11'-9" through temporary well screen before water sampling ■ Wet (caved) 11'-9" at

I hereby certify that the information on this form is true and correct to the best of my knowledge.

Signature  Firm **Soils & Engineering Services, Inc.**  
1102 Stewart Street Madison, Wisconsin 53713-4648 Tel: (608) 274-7600  
Fax: (608) 274-7511

This form is authorized by Chapters 281, 283, 289, 291, 292, 293, 295, and 299, Wis. Stats. Completion of this form is mandatory. Failure to file this form may result in forfeiture of between \$10 and \$25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. NOTE: See instructions for more information, including where the completed form should be sent.

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National  
Guard Base, Hoffman Street  
Boring Number E-510-3

SES Project Number **508.02**

Use only as an attachment to Form 4400-122.

Page 2 of 2

Sample		Blow Counts	Depth In Feet	Soil/Rock Description And Geologic Origin For Each Major Unit	U S C S	Graphic Log	Well Diagram	PID Readings	Soil Properties				P 200	RQD/ Comments
Number and Type	Length Att. & Recovered (in)								Pocket Penetrometer	Moisture Content	Liquid Limit	Plasticity Index		
						SP-SM								
			16											
			17											

**NOTE:**

- Set temporary  $\frac{3}{4}$ -inch-diameter PVC well with 5 feet of screen to 16'-0" depth. Used peristaltic pump to purge an approximate rate of 1 liter per 2.1 minutes. Purged approximately 13.9 liters (3.7 gallons) of water in approximately 29 minutes. Then collected water samples from peristaltic pump discharge. First collected PFOS/PFOA sample, then VOC sample, and finally a sample for field testing for the following measurements:  
 Temperature = 10.2 °C  
 Dissolved Oxygen = 3.93 mg/L  
 Specific Conductance = 864  $\mu$ S/cm  
 pH = 7.30  
 Turbidity = 5.85 NTU
- The Notes and Legend Record is considered a part of the WDNR Soil Boring Log Information Form 4400-122 and WDNR Soil Boring Log Information Supplement Form 4400-122A for Boring E-510-3.

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Route To: Watershed/Wastewater   
Remediation/Redevelopment   
Other

SES Project Number **508.02**

Page 1 of 2

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National Guard Base, Hoffman Street			License/Permit/Monitoring Number		Boring Number								
					E-510-4								
Boring Drilled By: Name of crew chief (first, last) and Firm <b>Scott W. Klumb Soils &amp; Engineering Services, Inc.</b>			Date Drilling Started	Date Drilling Completed	Drilling Method								
			February 2, 2021	February 2, 2021	DP								
WI Unique Well No.	DNR Well ID No.	Common Well Name	Final Static Water Level 851.4 Feet	Surface Elevation 863.8 Feet	Borehole Diameter 2.25 in								
Local Grid Origin <input type="checkbox"/> (estimated: <input type="checkbox"/> ) or Boring Location <input type="checkbox"/>			Local Grid Location										
State Plane ft. N, ft. E. S / C / N <u>SW</u> 1/4 of <u>NE</u> 1/4 of Sec. <u>29</u> , T. <u>8</u> N, R. <u>10</u> <u>E</u> /W			Lat _____	_____ N Feet	_____ E Feet								
Facility ID		County Dane	County Code 13	Civil Town/City/ or Village City of Madison/Civil Township of Burke									
Number and Type and Type	Length Att. & Recovered (in)	Blow Counts	Depth In Feet	Soil Properties		P 200	RQD/ Comments						
				U S C S	Graphic Log			Well Diagram	PID Readings	Pocket Penetrometer	Moisture Content	Liquid Limit	Plasticity Index
<b>Total Depth = 16'-0"</b>													
Soil/Rock Description And Geologic Origin For Each Major Unit													
1	30		1	CL		0.2	2.4						M; chemical sample obtained
2	35		2	CL SC		0.2							M
3	28		8	SM		0.2							M; chemical sample obtained
			12	SP-SM									12'-4" through temporary well screen before water sampling
			13										W Wet (caved) 12'-4" at completion
blind drilled, 12'-0" to 16'-0"													

I hereby certify that the information on this form is true and correct to the best of my knowledge.

Signature Craig M. Sauer Firm **Soils & Engineering Services, Inc.** Tel: (608) 274-7600  
1102 Stewart Street Madison, Wisconsin 53713-4648 Fax: (608) 274-7511

This form is authorized by Chapters 281, 283, 289, 291, 292, 293, 295, and 299, Wis. Stats. Completion of this form is mandatory. Failure to file this form may result in forfeiture of between \$10 and \$25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. NOTE: See instructions for more information, including where the completed form should be sent.

Facility/Project Name F-35: ADAL B510 Warehouse & Supply, Truax Air National  
Guard Base, Hoffman Street  
Boring Number E-510-4

SES Project Number **508.02**

Use only as an attachment to Form 4400-122.

Page 2 of 2

Sample		Blow Counts	Depth In Feet	Soil/Rock Description And Geologic Origin For Each Major Unit	U S C S	Graphic Log	Well Diagram	PID Readings	Soil Properties				P 200	RQD/ Comments
Number and Type	Length Att. & Recovered (in)								Pocket Penetrometer	Moisture Content	Liquid Limit	Plasticity Index		
						SP-SM								
			16											
			17											

**NOTE:**

- Set temporary  $\frac{3}{4}$ -inch-diameter PVC well with 5 feet of screen to 16'-0" depth. Used peristaltic pump to purge an approximate rate of 1 liter per 2.2 minutes. Purged approximately 11.6 liters (3.1 gallons) of water in approximately 25 minutes. Then collected water samples from peristaltic pump discharge. First collected PFOS/PFOA sample, then VOC sample, and finally a sample for field testing for the following measurements:  
 Temperature = 11.6 °C  
 Dissolved Oxygen = 6.10 mg/L  
 Specific Conductance = 668  $\mu$ S/cm  
 pH = 7.11  
 Turbidity = 1.26 NTU
- The Notes and Legend Record is considered a part of the WDNR Soil Boring Log Information Form 4400-122 and WDNR Soil Boring Log Information Supplement Form 4400-122A for Boring E-510-4.

24  
25  
26  
27  
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39

**Notice:** Completion of this report is required by chs. 160, 281, 283, 289, 291-293, 295, and 299, Wis. Stats., and ch. NR 141 and 812, Wis. Adm. Code. In accordance with chs. 281, 289, 291-293, 295, and 299, Wis. Stats., failure to file this form may result in a forfeiture of between \$10-25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. Return form to the appropriate DNR office and bureau. See instructions on reverse for more information.

**Route to:**

Verification Only of Fill and Seal

Drinking Water

Watershed/Wastewater

Remediation/Redevelopment

**SES Project Number 508.02**

Waste Management

Other:

**1. Well Location Information Boring Location Information**

County                      Boring Number

Dane

**E-510-1**

Latitude / Longitude (Degrees and Minutes)

Format Code

Method Code

DD

DDM

GPS008

SCR002

OTH001

1/4 1 1/4 SW 1/4 NE  
or Gov't Lot #

29

Section

Township

Range

E

W

Well Street Address

Boring

**Hoffman Street**

Well City, Village or Town  
Boring

Well ZIP Code  
Boring

City of Madison/Civil Township of Burke

Subdivision Name

Reason For Removal From Service  
**Soil Boring for GEOTECHNICAL sampling.**

WI Unique Well # of Replacement Well  
**NA**

**3. Well / Drillhole / Borehole Information**

Monitoring Well

Original Construction Date (mm/dd/yyyy)

**02/01/2021**

Water Well

Drillhole / Borehole

Boring Completion  
If a Well Construction Report is available, please attach.

**NA**

Construction Type:

Drilled

Driven (Sandpoint)

Dug

Other (specify): \_\_\_\_\_

Formation Type:

Unconsolidated Formation

Bedrock

Total Well Depth From Ground Surface (ft.)  
Boring

**16.0**

Casing Diameter (in.)

**NA**

Lower Drillhole Diameter (in.)

**2.3**

Casing Depth (ft.)

**NA**

Was well annular space grouted? **NA**  Yes  No  Unknown

If yes, to what depth (feet)?

Depth to Water (Feet)

**12.67**

**5. Material Used To Fill Well / Drillhole**

**Bentonite Chips**

**Caved Soil**

From (Ft.)

To (Ft.)

No. Yards Sacks Sealant  
or Volume (Circle one)

Mix Ratio or  
Mud Weight

**Surface**

**13.00**

**0.4 - 50 lb Bag**

**13.00**

**16.00**

**0.083 ft<sup>3</sup>**

**6. Comments**

NA = Not applicable to soil borings.

**7. Supervision of Work**

Name of Person or Firm Doing Filling & Sealing

**SOILS & ENGINEERING SERVICES, INC.**

Street or Route

**1102 Stewart Street**

License #

**02/01/2021**

Date of Filling & Sealing (mm/dd/yyyy)

**DNR Use Only**

Date Received

Noted By

Telephone Number

**(608) 274-7600**

Comments

City

**Madison**

State

**WI**

ZIP Code

**53713**

Signature of Person Doing Work

*Craig M. Bowser*

Date Signed

**04/07/2021**

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**Route to:**

Verification Only of Fill and Seal

Drinking Water

Watershed/Wastewater

Remediation/Redevelopment

**SES Project Number 508.02**

Waste Management

Other:

**1. Well Location Information Boring Location Information**

County                      Boring Number

Dane

**E-510-1X**

Latitude / Longitude (Degrees and Minutes)

Format Code

Method Code

DD

DDM

GPS008

SCR002

OTH001

1/4 1 1/4 SW 1/4 NE

Section  
or Gov't Lot #

**29**

Township

Range

E

8 N

10

W

Well Street Address

Boring

**Hoffman Street**

Well City, Village or Town  
Boring

Well ZIP Code  
Boring

City of Madison/Civil Township of Burke

Subdivision Name

Lot #

Reason For Removal From Service  
**Soil Boring for GEOTECHNICAL sampling.**

WI Unique Well # of Replacement Well  
**NA**

**3. Well / Drillhole / Borehole Information**

Monitoring Well  
 Water Well  
 Drillhole / Borehole

Original Construction Date (mm/dd/yyyy)  
Boring Completion

**02/01/2021**

If a Well Construction Report is  
available, please attach.

**NA**

Construction Type:

Drilled     Driven (Sandpoint)     Dug  
 Other (specify): \_\_\_\_\_

Formation Type:

Unconsolidated Formation     Bedrock

Total Well Depth From Ground Surface (ft.)  
Boring

**12.0**

Lower Drillhole Diameter (in.)

**2.3**

Was well annular space grouted?

**NA**  Yes     No     Unknown

If yes, to what depth (feet)?

Depth to Water (Feet)

**Dry**

**5. Material Used To Fill Well / Drillhole**

**Bentonite Chips**

From (Ft.)    To (Ft.)    No. Yards, Sacks Sealant or Volume (circle one)    Mix Ratio or Mud Weight

**Surface    12.00    0.5 - 50 lb Bag**

**6. Comments**

NA = Not applicable to soil borings.

**7. Supervision of Work**

Name of Person or Firm Doing Filling & Sealing

**SOILS & ENGINEERING SERVICES, INC.**

Street or Route

**1102 Stewart Street**

Date of Filling & Sealing (mm/dd/yyyy)

**02/01/2021**

DNR Use Only

Date Received

Noted By

Telephone Number

**(608) 274-7600**

Comments

City

**Madison**

State

**WI**

ZIP Code

**53713**

Signature of Person Doing Work

*Craig M. Bowser*

Date Signed

**04/07/2021**

**Notice:** Completion of this report is required by chs. 160, 281, 283, 289, 291-293, 295, and 299, Wis. Stats., and ch. NR 141 and 812, Wis. Adm. Code. In accordance with chs. 281, 289, 291-293, 295, and 299, Wis. Stats., failure to file this form may result in a forfeiture of between \$10-25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. Return form to the appropriate DNR office and bureau. See instructions on reverse for more information.

<input type="checkbox"/> Verification Only of Fill and Seal <b>SES Project Number 508.02</b>			Route to: <input type="checkbox"/> Drinking Water <input type="checkbox"/> Watershed/Wastewater <input type="checkbox"/> Waste Management <input type="checkbox"/> Other:					
<b>1. Well Location Information</b> Boring Location Information						<b>2. Facility / Owner Information</b>		
County <b>Dane</b>		Boring Number <b>E-510-2</b>			Facility Name <b>F-35: ADAL B510 Warehouse &amp; Supply, Truax Air National Guard Base</b> Facility ID (FID or PWS) <b>NA</b> License/Permit/Monitoring No <b>NA</b> Original Well Owner <b>NA</b> Present Well Owner Present Property Owner <b>Unknown</b> Mailing Address of Present Owner			
Latitude / Longitude (Degrees and Minutes)		Format Code	Method Code					
		<input type="checkbox"/> DD <input type="checkbox"/> DDM	<input type="checkbox"/> GPS008 <input type="checkbox"/> SCR002 <input type="checkbox"/> OTH001					
1/4 1/4 SW 1/4 NE or Gov't Lot #		Section <b>29</b>	Township <b>8 N</b>	Range <b>10</b>	E <input checked="" type="checkbox"/>	W <input type="checkbox"/>		
Well Street Address Boring <b>Hoffman Street</b>								
Well City, Village or Town Boring <b>City of Madison/Civil Township of Burke</b>			Well ZIP Code Boring					
Subdivision Name			Lot #			City of Present Owner		
State			Zip Code					
Reason For Removal From Service <b>Soil Boring for GEOTECHNICAL sampling.</b>						WI Unique Well # of Replacement Well <b>NA</b>		
<b>3. Well / Drillhole / Borehole Information</b>								
<input type="checkbox"/> Monitoring Well <input type="checkbox"/> Water Well <input checked="" type="checkbox"/> Drillhole / Borehole		Original Construction Date (mm/dd/yyyy) Boring Completion <b>02/01/2021</b>		If a Well Construction Report is available, please attach. <b>NA</b>				
Construction Type: <input checked="" type="checkbox"/> Drilled <input type="checkbox"/> Driven (Sandpoint) <input type="checkbox"/> Dug <input type="checkbox"/> Other (specify): _____								
Formation Type: <input checked="" type="checkbox"/> Unconsolidated Formation <input type="checkbox"/> Bedrock						Required Method of Placing Sealing Material <input type="checkbox"/> Conductor Pipe-Gravity <input type="checkbox"/> Conductor Pipe-Pumped <input checked="" type="checkbox"/> Screened & Poured (Bentonite Chips) <input type="checkbox"/> Other (Explain): _____		
Total Well Depth From Ground Surface (ft.) Boring <b>16.0</b>		Casing Diameter (in.) <b>NA</b>		Sealings Materials <input type="checkbox"/> Neat Cement Grout <input type="checkbox"/> Concrete <input type="checkbox"/> Sand-Cement (Concrete) Grout <input checked="" type="checkbox"/> Bentonite Chips				
Lower Drillhole Diameter (in.) <b>2.3</b>		Casing Depth (ft.) <b>NA</b>		For monitoring wells and monitoring well boreholes only <input type="checkbox"/> Bentonite Chips <input type="checkbox"/> Bentonite - Cement Grout <input type="checkbox"/> Granular Bentonite <input type="checkbox"/> Bentonite - Sand Slurry				
<b>5. Material Used To Fill Well / Drillhole</b>						From (Ft.)    To (Ft.)    No. Yards Sacks Sealant <i>(or Volume Circle one)</i> Mix Ratio or Mud Weight		
<b>Bentonite Chips</b>						<b>Surface</b> <b>13.33</b> <b>0.5 - 50 lb Bag</b>		
<b>Caved Soil</b>						<b>13.33</b> <b>16.00</b> <b>0.074 ft<sup>3</sup></b>		
<b>6. Comments</b> NA = Not applicable to soil borings.								
<b>7. Supervision of Work</b>						DNR Use Only		
Name of Person or Firm Doing Filling & Sealing <b>SOILS &amp; ENGINEERING SERVICES, INC.</b>			License #		Date of Filling & Sealing (mm/dd/yyyy) <b>02/01/2021</b>		Date Received	Noted By
Street or Route <b>1102 Stewart Street</b>				Telephone Number <b>(608) 274-7600</b>		Comments		
City <b>Madison</b>		State <b>WI</b>	ZIP Code <b>53713</b>	Signature of Person Doing Work <i>Craig M. Lower</i>		Date Signed <b>04/07/2021</b>		

**Notice:** Completion of this report is required by chs. 160, 281, 283, 289, 291-293, 295, and 299, Wis. Stats., and ch. NR 141 and 812, Wis. Adm. Code. In accordance with chs. 281, 289, 291-293, 295, and 299, Wis. Stats., failure to file this form may result in a forfeiture of between \$10-25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. Return form to the appropriate DNR office and bureau. See instructions on reverse for more information.

**Route to:**

Verification Only of Fill and Seal

Drinking Water

Watershed/Wastewater

Remediation/Redevelopment

**SES Project Number 508.02**

Waste Management

Other:

**1. Well Location Information Boring Location Information**

County                      Boring Number

Dane

**E-510-3**

Latitude / Longitude (Degrees and Minutes)

Format Code

DD

DDM

Method Code  
 GPS008  
 SCR002  
 OTH001

1/4 1 1/4 SW 1/4 NE  
or Gov't Lot #

29

Section

Township

Range

E

W

Well Street Address

Boring

**Hoffman Street**

Well City, Village or Town

Boring

Well ZIP Code

Boring

Subdivision Name

Lot #

Reason For Removal From Service  
**Soil Boring for GEOTECHNICAL sampling.**

WI Unique Well # of Replacement Well  
**NA**

**3. Well / Drillhole / Borehole Information**

Monitoring Well

Original Construction Date (mm/dd/yyyy)

Boring Completion  
**02/01/2021**

Water Well

If a Well Construction Report is available, please attach.

**NA**

Drillhole / Borehole

Construction Type:  
 Drilled     Driven (Sandpoint)     Dug

Other (specify): \_\_\_\_\_

Formation Type:

Unconsolidated Formation     Bedrock

Total Well Depth From Ground Surface (ft.) Casing Diameter (in.)  
Boring                      **16.0**                      NA

Lower Drillhole Diameter (in.) Casing Depth (ft.)  
2.3                      NA

Was well annular space grouted? **NA**  Yes     No     Unknown

If yes, to what depth (feet)? Depth to Water (Feet)  
11.75

**5. Material Used To Fill Well / Drillhole**

**Bentonite Chips**

**Caved Soil**

**4. Pump, Liner, Screen, Casing & Sealing Material**

Pump and piping removed?  Yes     No     N/A

Liner(s) removed?  Yes     No     N/A

Screen removed?  Yes     No     N/A

Casing left in place?  Yes     No     N/A

Was casing cut off below surface?  Yes     No     N/A

Did sealing material rise to surface?  Yes     No     N/A

Did material settle after 24 hours?  Yes     No     N/A

If yes, was hole retopped?  Yes     No     N/A

If bentonite chips were used, were they hydrated with water from a known safe source?  Yes     No     N/A

Required Method of Placing Sealing Material

Conductor Pipe-Gravity     Conductor Pipe-Pumped

Screened & Poured     Other (Explain): \_\_\_\_\_

Sealings Materials

Neat Cement Grout     Concrete

Sand-Cement (Concrete) Grout     Bentonite Chips

For monitoring wells and monitoring well boreholes only

Bentonite Chips     Bentonite - Cement Grout

Granular Bentonite     Bentonite - Sand Slurry

From (Ft.)	To (Ft.)	No. Yards Sacks Sealant or Volume (Circle one)	Mix Ratio or Mud Weight
------------	----------	--	-------------------------

**Surface**    **11.75**    **0.4 - 50 lb Bag**

**11.75**    **16.00**    **0.12 ft<sup>3</sup>**

**6. Comments**

NA = Not applicable to soil borings.

**7. Supervision of Work**

Name of Person or Firm Doing Filling & Sealing License # Date of Filling & Sealing (mm/dd/yyyy) Date Received Noted By

**SOILS & ENGINEERING SERVICES, INC.**

**02/01/2021**

Street or Route

Telephone Number

**1102 Stewart Street**

**(608) 274-7600**

City

**Madison**

State

**WI**

ZIP Code

**53713**

Signature of Person Doing Work

*Craig M. Bowser*

Date Signed

**04/07/2021**

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**Route to:**

Verification Only of Fill and Seal

Drinking Water

Watershed/Wastewater

Remediation/Redevelopment

**SES Project Number 508.02**

Waste Management

Other:

**1. Well Location Information Boring Location Information**

County                      Boring Number

Dane

**E-510-4**

Latitude / Longitude (Degrees and Minutes)

Format Code

Method Code

DD

DDM

GPS008

SCR002

OTH001

1/4 1 1/4 SW 1/4 NE

Section

Township

Range

E

or Gov't Lot #

29

8 N

10

W

Well Street Address

Boring

**Hoffman Street**

Well City, Village or Town

Boring

**City of Madison/Civil Township of Burke**

Subdivision Name

Well ZIP Code

Boring

Reason For Removal From Service  
**Soil Boring for GEOTECHNICAL sampling.**

WI Unique Well # of Replacement Well  
**NA**

**3. Well / Drillhole / Borehole Information**

Monitoring Well

Original Construction Date (mm/dd/yyyy)

**02/02/2021**

Water Well

Boring Completion

Drillhole / Borehole

If a Well Construction Report is available, please attach.

**NA**

Construction Type:

Drilled

Driven (Sandpoint)

Dug

Other (specify): \_\_\_\_\_

Formation Type:

Unconsolidated Formation

Bedrock

Total Well Depth From Ground Surface (ft.)  
Boring                      **16.0**

Casing Diameter (in.)  
**NA**

Lower Drillhole Diameter (in.)  
**2.3**

Casing Depth (ft.)  
**NA**

Was well annular space grouted? **NA**  Yes     No     Unknown

If yes, to what depth (feet)?

Depth to Water (Feet)

**12.33**

**5. Material Used To Fill Well / Drillhole**

**Bentonite Chips**

**Caved Soil**

From (Ft.)

To (Ft.)

No. Yards Sacks Sealant  
or Volume (Circle one)

Mix Ratio or  
Mud Weight

**Surface**

**0.5 - 50 lb Bag**

**12.33**

**16.00**

**0.10 ft<sup>3</sup>**

**6. Comments**

NA = Not applicable to soil borings.

**7. Supervision of Work**

Name of Person or Firm Doing Filling & Sealing

**SOILS & ENGINEERING SERVICES, INC.**

Street or Route

**1102 Stewart Street**

License #

**02/02/2021**

Date of Filling & Sealing (mm/dd/yyyy)

**DNR Use Only**

Date Received

Noted By

Telephone Number

**(608) 274-7600**

Comments

City

**Madison**

State

**WI**

ZIP Code

**53713**

Signature of Person Doing Work

*Craig M. Bowser*

Date Signed

**04/07/2021**

## **APPENDIX B**

### **Appendix B Contents**

- CT Laboratories, LLC Analytical Report dated March 8, 2021.
- VISTA Analytical Laboratory Analytical Report dated March 5, 2021

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Burns & McDonnell  
F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
April 7, 2021

Project 508.02  
City of Madison  
Dane County, Wisconsin  
Report 03



Geotechnical Engineers since 1966



## **ANALYTICAL REPORT**

SOILS & ENGINEERING SERVICES

DUANE REICHEL

1102 STEWART ST

MADISON, WI 53713

Project Name: TRUAX FIELD

Page 1 of 50

Project Phase: ADAL B510

Arrival Temperature: 4.3

Contract #: 1560

Report Date: 03/08/2021

Project #: XGFG 182011

Date Received: 02/03/2021

Folder #: 159556

Reprint Date: 03/09/2021

Purchase Order #: SES# 508.02

CT LAB Sample#: 530671 Sample Description: E510-1,S1,2'

Sampled: 02/01/2021 1045

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Inorganic Results</b>										
Solids, Percent	85.7	%	0.1	0.1	1		02/04/2021 11:57	02/04/2021 11:57	BMM	EPA 8000C
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.069	mg/kg	0.069	0.23	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.023	mg/kg	0.023	0.081	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.012	mg/kg	0.012	0.046	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1-Dichloroethane	<0.0081	mg/kg	0.0081	0.027	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1-Dichloroethene	<0.024	mg/kg	0.024	0.082	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,1-Dichloropropene	<0.035	mg/kg	0.035	0.10	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.013	mg/kg	0.013	0.043	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.046	mg/kg	0.046	0.16	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.020	mg/kg	0.020	0.067	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.081	mg/kg	0.081	0.28	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2-Dibromoethane	<0.012	mg/kg	0.012	0.046	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
1,2-Dichlorobenzene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2-Dichloroethane	<0.025	mg/kg	0.025	0.085	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,2-Dichloropropane	<0.030	mg/kg	0.030	0.099	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.016	mg/kg	0.016	0.052	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,3-Dichloropropane	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.017	mg/kg	0.017	0.059	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
2,2-Dichloropropane	<0.024	mg/kg	0.024	0.081	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
2-Butanone	<0.46	mg/kg	0.46	1.4	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
2-Chlorotoluene	<0.021	mg/kg	0.021	0.068	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
2-Hexanone	<0.23	mg/kg	0.23	0.81	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
4-Chlorotoluene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.21	mg/kg	0.21	0.70	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Acetone	<0.46	mg/kg	0.46	1.5	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Benzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Bromobenzene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Bromoform	<0.020	mg/kg	0.020	0.067	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Bromodichloromethane	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Bromoform	<0.069	mg/kg	0.069	0.22	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Bromomethane	<0.10	mg/kg	0.10	0.35	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Carbon disulfide	<0.046	mg/kg	0.046	0.14	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Carbon tetrachloride	<0.016	mg/kg	0.016	0.052	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Chlorobenzene	<0.012	mg/kg	0.012	0.037	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Chloroethane	<0.035	mg/kg	0.035	0.14	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Chloroform	<0.018	mg/kg	0.018	0.061	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Chloromethane	<0.035	mg/kg	0.035	0.12	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Dibromochloromethane	<0.046	mg/kg	0.046	0.16	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Dibromomethane	<0.024	mg/kg	0.024	0.081	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Dichlorodifluoromethane	<0.058	mg/kg	0.058	0.20	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Diisopropyl ether	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Ethylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Hexachlorobutadiene	<0.027	mg/kg	0.027	0.090	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Isopropylbenzene	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
m & p-Xylene	<0.029	mg/kg	0.029	0.095	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Methyl tert-butyl ether	<0.018	mg/kg	0.018	0.061	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Methylene chloride	<0.069	mg/kg	0.069	0.24	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
n-Butylbenzene	<0.020	mg/kg	0.020	0.064	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
n-Propylbenzene	<0.015	mg/kg	0.015	0.049	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Naphthalene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
o-Xylene	<0.0081	mg/kg	0.0081	0.025	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
p-Isopropyltoluene	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
sec-Butylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Styrene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
tert-Butylbenzene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Tetrachloroethene	<0.013	mg/kg	0.013	0.043	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Tetrahydrofuran	<0.29	mg/kg	0.29	0.96	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Toluene	<0.018	mg/kg	0.018	0.061	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.016	mg/kg	0.016	0.054	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530671	Sample Description: E510-1,S1,2'	Sampled: 02/01/2021 1045
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
trans-1,3-Dichloropropene	<0.046	mg/kg	0.046	0.14	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Trichloroethene	<0.022	mg/kg	0.022	0.072	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Trichlorofluoromethane	<0.046	mg/kg	0.046	0.14	1	M	02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C
Vinyl chloride	<0.022	mg/kg	0.022	0.074	1		02/04/2021 13:30	02/05/2021 13:14	RLD	EPA 8260C

#### Sub Lab Results

PFOA	<b>attached</b>	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	<b>attached</b>	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB

CT LAB Sample#: 530672	Sample Description: E510-1,S3,10'	Sampled: 02/01/2021 1125
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
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#### Inorganic Results

Solids, Percent	<b>86.5</b>	%	0.1	0.1	1		02/04/2021 11:57	BMM	EPA 8000C
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#### Organic Results

1,1,1,2-Tetrachloroethane	<0.062	mg/kg	0.062	0.21	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.021	mg/kg	0.021	0.072	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.010	mg/kg	0.010	0.041	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1-Dichloroethane	<0.0072	mg/kg	0.0072	0.024	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1-Dichloroethene	<0.022	mg/kg	0.022	0.073	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,1-Dichloropropene	<0.031	mg/kg	0.031	0.093	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.011	mg/kg	0.011	0.038	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.041	mg/kg	0.041	0.14	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
1,2,4-Trimethylbenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.072	mg/kg	0.072	0.25	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2-Dibromoethane	<0.010	mg/kg	0.010	0.041	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2-Dichloroethane	<0.023	mg/kg	0.023	0.077	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,2-Dichloropropane	<0.027	mg/kg	0.027	0.089	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.013	mg/kg	0.013	0.045	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,3-Dichloropropane	<0.014	mg/kg	0.014	0.050	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
2,2-Dichloropropane	<0.022	mg/kg	0.022	0.072	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
2-Butanone	<0.41	mg/kg	0.41	1.2	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
2-Chlorotoluene	<0.019	mg/kg	0.019	0.061	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
2-Hexanone	<0.21	mg/kg	0.21	0.72	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
4-Chlorotoluene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.19	mg/kg	0.19	0.63	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Acetone	<0.41	mg/kg	0.41	1.3	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Benzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Bromobenzene	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Bromochloromethane	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Bromodichloromethane	<0.014	mg/kg	0.014	0.048	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Bromoform	<0.062	mg/kg	0.062	0.20	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Bromomethane	<0.093	mg/kg	0.093	0.31	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Carbon disulfide	<0.041	mg/kg	0.041	0.12	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Carbon tetrachloride	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Chlorobenzene	<0.010	mg/kg	0.010	0.033	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Chloroethane	<0.031	mg/kg	0.031	0.12	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Chloroform	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Chloromethane	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.028	mg/kg	0.028	0.093	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.014	mg/kg	0.014	0.050	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Dibromochloromethane	<0.041	mg/kg	0.041	0.14	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Dibromomethane	<0.022	mg/kg	0.022	0.072	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Dichlorodifluoromethane	<0.052	mg/kg	0.052	0.18	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Diisopropyl ether	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Ethylbenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Hexachlorobutadiene	<0.024	mg/kg	0.024	0.081	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Isopropylbenzene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
m & p-Xylene	<0.026	mg/kg	0.026	0.085	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Methyl tert-butyl ether	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Methylene chloride	<0.062	mg/kg	0.062	0.22	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
n-Butylbenzene	<0.018	mg/kg	0.018	0.057	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
n-Propylbenzene	<0.013	mg/kg	0.013	0.043	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Naphthalene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
o-Xylene	<0.0072	mg/kg	0.0072	0.023	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
p-Isopropyltoluene	<0.013	mg/kg	0.013	0.045	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
sec-Butylbenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Styrene	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
tert-Butylbenzene	<0.012	mg/kg	0.012	0.042	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Tetrachloroethene	<0.011	mg/kg	0.011	0.038	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530672	Sample Description: E510-1,S3,10'	Sampled: 02/01/2021 1125
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Tetrahydrofuran	<0.26	mg/kg	0.26	0.86	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Toluene	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
trans-1,3-Dichloropropene	<0.041	mg/kg	0.041	0.12	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Trichloroethene	<0.020	mg/kg	0.020	0.064	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Trichlorofluoromethane	<0.041	mg/kg	0.041	0.12	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C
Vinyl chloride	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 13:44	RLD	EPA 8260C

#### Sub Lab Results

PFOA	attached	mg/kg	N/A	N/A	1		03/08/2021	00:00	SUB
PFOS	attached	mg/kg	N/A	N/A	1		03/08/2021	00:00	SUB

CT LAB Sample#: 530673	Sample Description: E510-1, DUP	Sampled: 02/01/2021 1125
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Inorganic Results</b>										
Solids, Percent	91.6	%	0.1	0.1	1		02/04/2021	11:57	BMM	EPA 8000C
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.058	mg/kg	0.058	0.19	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.019	mg/kg	0.019	0.068	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.0097	mg/kg	0.0097	0.039	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1-Dichloroethane	<0.0068	mg/kg	0.0068	0.022	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1-Dichloroethene	<0.020	mg/kg	0.020	0.069	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,1-Dichloropropene	<0.029	mg/kg	0.029	0.087	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
1,2,3-Trichlorobenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.039	mg/kg	0.039	0.14	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.016	mg/kg	0.016	0.056	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.011	mg/kg	0.011	0.034	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.068	mg/kg	0.068	0.23	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2-Dibromoethane	<0.0097	mg/kg	0.0097	0.039	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2-Dichloroethane	<0.021	mg/kg	0.021	0.071	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,2-Dichloropropane	<0.025	mg/kg	0.025	0.083	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.013	mg/kg	0.013	0.043	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.014	mg/kg	0.014	0.043	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,3-Dichloropropane	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
2,2-Dichloropropane	<0.020	mg/kg	0.020	0.068	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
2-Butanone	<0.39	mg/kg	0.39	1.2	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
2-Chlorotoluene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
2-Hexanone	<0.19	mg/kg	0.19	0.68	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
4-Chlorotoluene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.17	mg/kg	0.17	0.59	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Acetone	<0.39	mg/kg	0.39	1.3	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Benzene	<0.011	mg/kg	0.011	0.034	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Bromobenzene	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Bromochloromethane	<0.016	mg/kg	0.016	0.056	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Bromodichloromethane	<0.014	mg/kg	0.014	0.044	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Bromoform	<0.058	mg/kg	0.058	0.18	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Bromomethane	<0.087	mg/kg	0.087	0.29	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Carbon disulfide	<0.039	mg/kg	0.039	0.12	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Carbon tetrachloride	<0.014	mg/kg	0.014	0.043	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Chlorobenzene	<0.0097	mg/kg	0.0097	0.031	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Chloroethane	<0.029	mg/kg	0.029	0.12	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Chloroform	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Chloromethane	<0.029	mg/kg	0.029	0.097	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.026	mg/kg	0.026	0.087	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Dibromochloromethane	<0.039	mg/kg	0.039	0.14	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Dibromomethane	<0.020	mg/kg	0.020	0.068	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Dichlorodifluoromethane	<0.048	mg/kg	0.048	0.16	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Diisopropyl ether	<0.017	mg/kg	0.017	0.059	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Ethylbenzene	<0.011	mg/kg	0.011	0.034	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Hexachlorobutadiene	<0.022	mg/kg	0.022	0.075	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Isopropylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
m & p-Xylene	<0.024	mg/kg	0.024	0.079	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Methyl tert-butyl ether	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Methylene chloride	<0.058	mg/kg	0.058	0.20	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
n-Butylbenzene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
n-Propylbenzene	<0.013	mg/kg	0.013	0.041	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Naphthalene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
o-Xylene	<0.0068	mg/kg	0.0068	0.021	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
p-Isopropyltoluene	<0.013	mg/kg	0.013	0.043	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
sec-Butylbenzene	<0.011	mg/kg	0.011	0.034	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530673	Sample Description: E510-1, DUP	Sampled: 02/01/2021 1125
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Styrene	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
tert-Butylbenzene	<0.012	mg/kg	0.012	0.040	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Tetrachloroethene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Tetrahydrofuran	<0.24	mg/kg	0.24	0.80	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Toluene	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.014	mg/kg	0.014	0.045	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
trans-1,3-Dichloropropene	<0.039	mg/kg	0.039	0.12	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Trichloroethene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Trichlorofluoromethane	<0.039	mg/kg	0.039	0.12	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C
Vinyl chloride	<0.018	mg/kg	0.018	0.062	1		02/04/2021 13:30	02/05/2021 14:15	RLD	EPA 8260C

#### Sub Lab Results

PFOA	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB

CT LAB Sample#: 530674	Sample Description: E510-2,S1,2'	Sampled: 02/01/2021 1155
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Inorganic Results</b>										
Solids, Percent	91.7	%	0.1	0.1	1			02/04/2021 11:57	BMM	EPA 8000C
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.053	mg/kg	0.053	0.18	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.018	mg/kg	0.018	0.062	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.0089	mg/kg	0.0089	0.036	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
1,1-Dichloroethane	<0.0062	mg/kg	0.0062	0.020	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,1-Dichloroethene	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,1-Dichloropropene	<0.027	mg/kg	0.027	0.080	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.0098	mg/kg	0.0098	0.033	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.036	mg/kg	0.036	0.12	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.015	mg/kg	0.015	0.052	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.0098	mg/kg	0.0098	0.031	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.062	mg/kg	0.062	0.21	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2-Dibromoethane	<0.0089	mg/kg	0.0089	0.036	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2-Dichloroethane	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,2-Dichloropropene	<0.023	mg/kg	0.023	0.076	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.012	mg/kg	0.012	0.039	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.012	mg/kg	0.012	0.040	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,3-Dichloropropane	<0.012	mg/kg	0.012	0.043	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.013	mg/kg	0.013	0.045	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
2,2-Dichloropropane	<0.019	mg/kg	0.019	0.062	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
2-Butanone	<0.36	mg/kg	0.36	1.1	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
2-Chlorotoluene	<0.016	mg/kg	0.016	0.052	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
2-Hexanone	<0.18	mg/kg	0.18	0.62	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
4-Chlorotoluene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.16	mg/kg	0.16	0.54	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Acetone	<0.36	mg/kg	0.36	1.2	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Benzene	<0.0098	mg/kg	0.0098	0.031	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Bromobenzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Bromochloromethane	<0.015	mg/kg	0.015	0.052	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Bromodichloromethane	<0.012	mg/kg	0.012	0.041	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Bromoform	<0.053	mg/kg	0.053	0.17	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Bromomethane	<0.080	mg/kg	0.080	0.27	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Carbon disulfide	<0.036	mg/kg	0.036	0.11	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Carbon tetrachloride	<0.012	mg/kg	0.012	0.040	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Chlorobenzene	<0.0089	mg/kg	0.0089	0.028	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Chloroethane	<0.027	mg/kg	0.027	0.11	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Chloroform	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Chloromethane	<0.027	mg/kg	0.027	0.089	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.024	mg/kg	0.024	0.080	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.012	mg/kg	0.012	0.043	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Dibromochloromethane	<0.036	mg/kg	0.036	0.12	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Dibromomethane	<0.019	mg/kg	0.019	0.062	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Dichlorodifluoromethane	<0.044	mg/kg	0.044	0.15	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Diisopropyl ether	<0.016	mg/kg	0.016	0.054	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Ethylbenzene	<0.0098	mg/kg	0.0098	0.031	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Hexachlorobutadiene	<0.020	mg/kg	0.020	0.069	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Isopropylbenzene	<0.012	mg/kg	0.012	0.038	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
m & p-Xylene	<0.022	mg/kg	0.022	0.073	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Methyl tert-butyl ether	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Methylene chloride	<0.053	mg/kg	0.053	0.19	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
n-Butylbenzene	<0.015	mg/kg	0.015	0.049	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
n-Propylbenzene	<0.012	mg/kg	0.012	0.037	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Naphthalene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530674	Sample Description: E510-2,S1,2'	Sampled: 02/01/2021 1155
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
o-Xylene	<0.0062	mg/kg	0.0062	0.020	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
p-Isopropyltoluene	<0.012	mg/kg	0.012	0.039	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
sec-Butylbenzene	<0.0098	mg/kg	0.0098	0.031	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Styrene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
tert-Butylbenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Tetrachloroethene	<0.0098	mg/kg	0.0098	0.033	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Tetrahydrofuran	<0.22	mg/kg	0.22	0.74	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Toluene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.012	mg/kg	0.012	0.042	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
trans-1,3-Dichloropropene	<0.036	mg/kg	0.036	0.11	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Trichloroethene	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Trichlorofluoromethane	<0.036	mg/kg	0.036	0.11	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C
Vinyl chloride	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 14:45	RLD	EPA 8260C

#### Sub Lab Results

PFOA	attached	mg/kg	N/A	N/A	1	03/08/2021 00:00	SUB
PFOS	attached	mg/kg	N/A	N/A	1	03/08/2021 00:00	SUB

CT LAB Sample#: 530675	Sample Description: E510-2,S3,10'	Sampled: 02/01/2021 1210
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
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#### Inorganic Results

Solids, Percent	90.5	%	0.1	0.1	1		02/04/2021 11:57	BMM	EPA 8000C
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#### Organic Results

1,1,1,2-Tetrachloroethane	<0.075	mg/kg	0.075	0.25	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
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Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
1,1,1-Trichloroethane	<0.020	mg/kg	0.020	0.065	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.025	mg/kg	0.025	0.088	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.013	mg/kg	0.013	0.050	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,1-Dichloroethane	<0.0088	mg/kg	0.0088	0.029	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,1-Dichloroethene	<0.026	mg/kg	0.026	0.089	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,1-Dichloropropene	<0.038	mg/kg	0.038	0.11	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.050	mg/kg	0.050	0.18	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.021	mg/kg	0.021	0.073	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.014	mg/kg	0.014	0.044	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.088	mg/kg	0.088	0.30	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2-Dibromoethane	<0.013	mg/kg	0.013	0.050	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.019	mg/kg	0.019	0.061	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2-Dichloroethane	<0.028	mg/kg	0.028	0.093	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,2-Dichloropropene	<0.033	mg/kg	0.033	0.11	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.018	mg/kg	0.018	0.056	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,3-Dichloropropane	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.019	mg/kg	0.019	0.064	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
2,2-Dichloropropane	<0.026	mg/kg	0.026	0.088	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
2-Butanone	<0.50	mg/kg	0.50	1.5	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
2-Chlorotoluene	<0.023	mg/kg	0.023	0.074	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
2-Hexanone	<0.25	mg/kg	0.25	0.88	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
4-Chlorotoluene	<0.019	mg/kg	0.019	0.061	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.23	mg/kg	0.23	0.76	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Acetone	<0.50	mg/kg	0.50	1.6	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Benzene	<0.014	mg/kg	0.014	0.044	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Bromobenzene	<0.020	mg/kg	0.020	0.065	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Bromoform	<0.021	mg/kg	0.021	0.073	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Bromodichloromethane	<0.018	mg/kg	0.018	0.058	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Bromoform	<0.075	mg/kg	0.075	0.24	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Bromomethane	<0.11	mg/kg	0.11	0.38	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Carbon disulfide	<0.050	mg/kg	0.050	0.15	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Carbon tetrachloride	<0.018	mg/kg	0.018	0.056	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Chlorobenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Chloroethane	<0.038	mg/kg	0.038	0.15	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Chloroform	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Chloromethane	<0.038	mg/kg	0.038	0.13	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.034	mg/kg	0.034	0.11	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Dibromochloromethane	<0.050	mg/kg	0.050	0.18	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Dibromomethane	<0.026	mg/kg	0.026	0.088	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Dichlorodifluoromethane	<0.063	mg/kg	0.063	0.21	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Diisopropyl ether	<0.023	mg/kg	0.023	0.076	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Ethylbenzene	<0.014	mg/kg	0.014	0.044	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Hexachlorobutadiene	<0.029	mg/kg	0.029	0.098	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Isopropylbenzene	<0.016	mg/kg	0.016	0.054	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
m & p-Xylene	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Methyl tert-butyl ether	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Methylene chloride	<0.075	mg/kg	0.075	0.26	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530675	Sample Description: E510-2,S3,10'	Sampled: 02/01/2021 1210
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
n-Butylbenzene	<0.021	mg/kg	0.021	0.069	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
n-Propylbenzene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Naphthalene	<0.019	mg/kg	0.019	0.061	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
o-Xylene	<0.0088	mg/kg	0.0088	0.028	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
p-Isopropyltoluene	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
sec-Butylbenzene	<0.014	mg/kg	0.014	0.044	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Styrene	<0.020	mg/kg	0.020	0.065	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
tert-Butylbenzene	<0.015	mg/kg	0.015	0.051	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Tetrachloroethene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Tetrahydrofuran	<0.31	mg/kg	0.31	1.0	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Toluene	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
trans-1,3-Dichloropropene	<0.050	mg/kg	0.050	0.15	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Trichloroethene	<0.024	mg/kg	0.024	0.078	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Trichlorofluoromethane	<0.050	mg/kg	0.050	0.15	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C
Vinyl chloride	<0.024	mg/kg	0.024	0.080	1		02/04/2021 13:30	02/05/2021 15:16	RLD	EPA 8260C

#### Sub Lab Results

PFOA	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB

CT LAB Sample#: 530676	Sample Description: E510-3,S1,2'	Sampled: 02/01/2021 1230
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
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#### Inorganic Results

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Solids, Percent	<b>84.5</b>	%	0.1	0.1	1			02/04/2021 11:57	BMM	EPA 8000C
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.068	mg/kg	0.068	0.23	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.023	mg/kg	0.023	0.080	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.011	mg/kg	0.011	0.046	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1-Dichloroethane	<0.0080	mg/kg	0.0080	0.026	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1-Dichloroethene	<0.024	mg/kg	0.024	0.081	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,1-Dichloropropene	<0.034	mg/kg	0.034	0.10	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.046	mg/kg	0.046	0.16	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.019	mg/kg	0.019	0.066	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.080	mg/kg	0.080	0.27	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2-Dibromoethane	<0.011	mg/kg	0.011	0.046	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2-Dichloroethane	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,2-Dichloropropene	<0.030	mg/kg	0.030	0.098	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,3-Dichloropropane	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.017	mg/kg	0.017	0.058	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
2,2-Dichloropropane	<0.024	mg/kg	0.024	0.080	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
2-Butanone	<0.46	mg/kg	0.46	1.4	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
2-Chlorotoluene	<0.021	mg/kg	0.021	0.067	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
2-Hexanone	<0.23	mg/kg	0.23	0.80	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
4-Chlorotoluene	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.21	mg/kg	0.21	0.70	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Acetone	<0.46	mg/kg	0.46	1.5	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Benzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Bromobenzene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Bromochloromethane	<0.019	mg/kg	0.019	0.066	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Bromodichloromethane	<0.016	mg/kg	0.016	0.052	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Bromoform	<0.068	mg/kg	0.068	0.22	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Bromomethane	<0.10	mg/kg	0.10	0.34	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Carbon disulfide	<0.046	mg/kg	0.046	0.14	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Carbon tetrachloride	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Chlorobenzene	<0.011	mg/kg	0.011	0.036	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Chloroethane	<0.034	mg/kg	0.034	0.14	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Chloroform	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Chloromethane	<0.034	mg/kg	0.034	0.11	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.016	mg/kg	0.016	0.055	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Dibromochloromethane	<0.046	mg/kg	0.046	0.16	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Dibromomethane	<0.024	mg/kg	0.024	0.080	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Dichlorodifluoromethane	<0.057	mg/kg	0.057	0.19	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Diisopropyl ether	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Ethylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Hexachlorobutadiene	<0.026	mg/kg	0.026	0.089	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C
Isopropylbenzene	<0.015	mg/kg	0.015	0.049	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530676 Sample Description: E510-3,S1,2'										Sampled: 02/01/2021 1230		
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method		
m & p-Xylene	<0.029	mg/kg	0.029	0.093	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Methyl tert-butyl ether	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Methylene chloride	<0.068	mg/kg	0.068	0.24	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
n-Butylbenzene	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
n-Propylbenzene	<0.015	mg/kg	0.015	0.048	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Naphthalene	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
o-Xylene	<0.0080	mg/kg	0.0080	0.025	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
p-Isopropyltoluene	<0.015	mg/kg	0.015	0.050	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
sec-Butylbenzene	<0.013	mg/kg	0.013	0.040	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Styrene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
tert-Butylbenzene	<0.014	mg/kg	0.014	0.047	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Tetrachloroethene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Tetrahydrofuran	<0.29	mg/kg	0.29	0.95	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Toluene	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
trans-1,2-Dichloroethene	<0.016	mg/kg	0.016	0.054	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
trans-1,3-Dichloropropene	<0.046	mg/kg	0.046	0.14	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Trichloroethene	<0.022	mg/kg	0.022	0.071	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Trichlorofluoromethane	<0.046	mg/kg	0.046	0.14	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
Vinyl chloride	<0.022	mg/kg	0.022	0.073	1		02/04/2021 13:30	02/05/2021 15:46	RLD	EPA 8260C		
<b>Sub Lab Results</b>												
PFOA	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			
PFOS	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530677	Sample Description: E510-3,S2,9 1/2'	Sampled: 02/01/2021 1240
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Inorganic Results</b>										
Solids, Percent	87.7	%	0.1	0.1	1		02/04/2021 11:57	02/04/2021 11:57	BMM	EPA 8000C
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.072	mg/kg	0.072	0.24	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.019	mg/kg	0.019	0.062	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.024	mg/kg	0.024	0.084	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.012	mg/kg	0.012	0.048	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1-Dichloroethane	<0.0084	mg/kg	0.0084	0.027	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1-Dichloroethene	<0.025	mg/kg	0.025	0.085	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,1-Dichloropropene	<0.036	mg/kg	0.036	0.11	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.048	mg/kg	0.048	0.17	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.020	mg/kg	0.020	0.069	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.084	mg/kg	0.084	0.29	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2-Dibromoethane	<0.012	mg/kg	0.012	0.048	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2-Dichloroethane	<0.026	mg/kg	0.026	0.088	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,2-Dichloropropane	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,3-Dichloropropane	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.018	mg/kg	0.018	0.061	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
2,2-Dichloropropane	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
2-Butanone	<0.48	mg/kg	0.48	1.4	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
2-Chlorotoluene	<0.022	mg/kg	0.022	0.071	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
2-Hexanone	<0.24	mg/kg	0.24	0.84	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
4-Chlorotoluene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.22	mg/kg	0.22	0.73	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Acetone	<0.48	mg/kg	0.48	1.6	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Benzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Bromobenzene	<0.019	mg/kg	0.019	0.062	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Bromochloromethane	<0.020	mg/kg	0.020	0.069	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Bromodichloromethane	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Bromoform	<0.072	mg/kg	0.072	0.23	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Bromomethane	<0.11	mg/kg	0.11	0.36	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Carbon disulfide	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Carbon tetrachloride	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Chlorobenzene	<0.012	mg/kg	0.012	0.038	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Chloroethane	<0.036	mg/kg	0.036	0.14	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Chloroform	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Chloromethane	<0.036	mg/kg	0.036	0.12	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.032	mg/kg	0.032	0.11	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Dibromochloromethane	<0.048	mg/kg	0.048	0.17	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Dibromomethane	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Dichlorodifluoromethane	<0.060	mg/kg	0.060	0.20	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Diisopropyl ether	<0.022	mg/kg	0.022	0.073	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C
Ethylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530677 Sample Description: E510-3,S2,9 1/2'										Sampled: 02/01/2021 1240		
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method		
Hexachlorobutadiene	<0.027	mg/kg	0.027	0.093	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Isopropylbenzene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
m & p-Xylene	<0.030	mg/kg	0.030	0.098	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Methyl tert-butyl ether	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Methylene chloride	<0.072	mg/kg	0.072	0.25	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
n-Butylbenzene	<0.020	mg/kg	0.020	0.066	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
n-Propylbenzene	<0.016	mg/kg	0.016	0.050	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Naphthalene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
o-Xylene	<0.0084	mg/kg	0.0084	0.026	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
p-Isopropyltoluene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
sec-Butylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Styrene	<0.019	mg/kg	0.019	0.062	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
tert-Butylbenzene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Tetrachloroethene	<0.013	mg/kg	0.013	0.044	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Tetrahydrofuran	<0.30	mg/kg	0.30	0.99	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Toluene	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
trans-1,2-Dichloroethene	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
trans-1,3-Dichloropropene	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Trichloroethene	<0.023	mg/kg	0.023	0.074	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Trichlorofluoromethane	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
Vinyl chloride	<0.023	mg/kg	0.023	0.076	1		02/04/2021 13:30	02/05/2021 16:17	RLD	EPA 8260C		
<b>Sub Lab Results</b>												
PFOA	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			
PFOS	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530678	Sample Description: E510-3	Sampled: 02/01/2021 1405
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021	17:41	DGS	EPA 8260C
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021	17:41	DGS	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021	17:41	DGS	EPA 8260C
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021	17:41	DGS	EPA 8260C
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021	17:41	DGS	EPA 8260C
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021	17:41	DGS	EPA 8260C
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021	17:41	DGS	EPA 8260C
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021	17:41	DGS	EPA 8260C
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021	17:41	DGS	EPA 8260C
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021	17:41	DGS	EPA 8260C
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021	17:41	DGS	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021	17:41	DGS	EPA 8260C
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021	17:41	DGS	EPA 8260C
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021	17:41	DGS	EPA 8260C
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021	17:41	DGS	EPA 8260C
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021	17:41	DGS	EPA 8260C
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021	17:41	DGS	EPA 8260C
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021	17:41	DGS	EPA 8260C
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021	17:41	DGS	EPA 8260C
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021	17:41	DGS	EPA 8260C
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021	17:41	DGS	EPA 8260C
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021	17:41	DGS	EPA 8260C
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021	17:41	DGS	EPA 8260C
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021	17:41	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 17:41	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 17:41	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 17:41	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 17:41	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 17:41	DGS	EPA 8260C
Bromochloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 17:41	DGS	EPA 8260C
Bromodichloromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 17:41	DGS	EPA 8260C
Bromoform	<0.90	ug/L	0.90	3.1	1			02/09/2021 17:41	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 17:41	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 17:41	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 17:41	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 17:41	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 17:41	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 17:41	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 17:41	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 17:41	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 17:41	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 17:41	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis



SOILS & ENGINEERING SERVICES  
Project Name: TRUAX FIELD  
Project #: XGFG 182011  
Project Phase: ADAL B510

Contract #: 1560  
Folder #: 159556  
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CT LAB Sample#: 530678 Sample Description: E510-3								Sampled: 02/01/2021 1405		
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 17:41	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 17:41	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 17:41	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 17:41	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 17:41	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 17:41	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 17:41	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 17:41	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 17:41	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 17:41	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 17:41	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 17:41	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 17:41	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 17:41	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 17:41	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

CT LAB Sample#: 530679	Sample Description: E510-1	Sampled: 02/01/2021 1450
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021	18:13	DGS	EPA 8260C
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021	18:13	DGS	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021	18:13	DGS	EPA 8260C
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021	18:13	DGS	EPA 8260C
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021	18:13	DGS	EPA 8260C
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021	18:13	DGS	EPA 8260C
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021	18:13	DGS	EPA 8260C
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021	18:13	DGS	EPA 8260C
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021	18:13	DGS	EPA 8260C
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021	18:13	DGS	EPA 8260C
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021	18:13	DGS	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021	18:13	DGS	EPA 8260C
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021	18:13	DGS	EPA 8260C
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021	18:13	DGS	EPA 8260C
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021	18:13	DGS	EPA 8260C
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021	18:13	DGS	EPA 8260C
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021	18:13	DGS	EPA 8260C
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021	18:13	DGS	EPA 8260C
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021	18:13	DGS	EPA 8260C
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021	18:13	DGS	EPA 8260C
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021	18:13	DGS	EPA 8260C
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021	18:13	DGS	EPA 8260C
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021	18:13	DGS	EPA 8260C
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021	18:13	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 18:13	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 18:13	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 18:13	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:13	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 18:13	DGS	EPA 8260C
Bromochloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 18:13	DGS	EPA 8260C
Bromodichloromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:13	DGS	EPA 8260C
Bromoform	<0.90	ug/L	0.90	3.1	1			02/09/2021 18:13	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 18:13	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 18:13	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 18:13	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 18:13	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 18:13	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 18:13	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:13	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:13	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:13	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 18:13	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530679	Sample Description: E510-1	Sampled: 02/01/2021 1450
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 18:13	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 18:13	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 18:13	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 18:13	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:13	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 18:13	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:13	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 18:13	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 18:13	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 18:13	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 18:13	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 18:13	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:13	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 18:13	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 18:13	DGS	EPA 8260C
<b>Sub Lab Results</b>										
PFOA	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	
PFOS	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021 18:44	02/09/2021 18:44	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 18:44	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 18:44	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 18:44	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:44	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 18:44	DGS	EPA 8260C
Bromochloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 18:44	DGS	EPA 8260C
Bromodichloromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:44	DGS	EPA 8260C
Bromoform	<0.90	ug/L	0.90	3.1	1			02/09/2021 18:44	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 18:44	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 18:44	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 18:44	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 18:44	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 18:44	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 18:44	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:44	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 18:44	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:44	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 18:44	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 18:44	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 18:44	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 18:44	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 18:44	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:44	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 18:44	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 18:44	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 18:44	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 18:44	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 18:44	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 18:44	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 18:44	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 18:44	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 18:44	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 18:44	DGS	EPA 8260C
<b>Sub Lab Results</b>										
PFOA	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	
PFOS	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530681	Sample Description: E510-2	Sampled: 02/01/2021 1605
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021 19:16	DGS	EPA 8260C	
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021 19:16	DGS	EPA 8260C	
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021 19:16	DGS	EPA 8260C	
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021 19:16	DGS	EPA 8260C	
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021 19:16	DGS	EPA 8260C	
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021 19:16	DGS	EPA 8260C	
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:16	DGS	EPA 8260C	
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021 19:16	DGS	EPA 8260C	
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021 19:16	DGS	EPA 8260C	
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021 19:16	DGS	EPA 8260C	
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021 19:16	DGS	EPA 8260C	

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 19:16	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 19:16	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 19:16	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:16	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 19:16	DGS	EPA 8260C
Bromochloromethane	<0.30	ug/L	0.30	1.0	1			02/09/2021 19:16	DGS	EPA 8260C
Bromodichloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 19:16	DGS	EPA 8260C
Bromoform	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:16	DGS	EPA 8260C
Bromomethane	<0.90	ug/L	0.90	3.1	1			02/09/2021 19:16	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 19:16	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 19:16	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 19:16	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 19:16	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 19:16	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 19:16	DGS	EPA 8260C
Dichlorodifluoromethane	<b>0.80</b>	ug/L	0.40 *	1.3	1			02/09/2021 19:16	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:16	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:16	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 19:16	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#:	530681	Sample Description:	E510-2	Sampled:	02/01/2021 1605
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 19:16	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 19:16	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 19:16	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 19:16	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:16	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 19:16	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:16	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 19:16	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 19:16	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 19:16	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 19:16	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 19:16	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:16	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 19:16	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 19:16	DGS	EPA 8260C

#### Sub Lab Results

PFOA	<b>attached</b>	ug/L	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	<b>attached</b>	ug/L	N/A	N/A	1		03/08/2021 00:00	SUB

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021 12:26	02/09/2021 12:26	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 12:26	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 12:26	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 12:26	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:26	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:26	DGS	EPA 8260C
Bromochloromethane	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:26	DGS	EPA 8260C
Bromodichloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 12:26	DGS	EPA 8260C
Bromoform	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:26	DGS	EPA 8260C
Bromomethane	<0.90	ug/L	0.90	3.1	1			02/09/2021 12:26	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 12:26	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 12:26	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 12:26	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 12:26	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 12:26	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 12:26	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:26	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:26	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:26	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 12:26	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#:	530682	Sample Description:	TRIP BLANK	Sampled:	02/01/2021
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 12:26	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 12:26	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:26	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 12:26	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:26	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 12:26	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:26	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 12:26	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 12:26	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 12:26	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 12:26	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 12:26	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:26	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 12:26	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 12:26	DGS	EPA 8260C

CT LAB Sample#:	530683	Sample Description:	E510-4,S1,2'	Sampled:	02/02/2021 1340
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
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### Inorganic Results

Solids, Percent	81.5	%	0.1	0.1	1			02/04/2021 11:57	BMM	EPA 8000C
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Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530683	Sample Description: E510-4,S1,2'	Sampled: 02/02/2021 1340
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.079	mg/kg	0.079	0.26	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.021	mg/kg	0.021	0.068	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.026	mg/kg	0.026	0.092	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.013	mg/kg	0.013	0.053	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1-Dichloroethane	<0.0092	mg/kg	0.0092	0.030	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1-Dichloroethene	<0.028	mg/kg	0.028	0.093	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,1-Dichloropropene	<0.039	mg/kg	0.039	0.12	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.053	mg/kg	0.053	0.18	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.022	mg/kg	0.022	0.076	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.092	mg/kg	0.092	0.32	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2-Dibromoethane	<0.013	mg/kg	0.013	0.053	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.020	mg/kg	0.020	0.064	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2-Dichloroethane	<0.029	mg/kg	0.029	0.097	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,2-Dichloropropane	<0.034	mg/kg	0.034	0.11	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.017	mg/kg	0.017	0.058	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,3-Dichloropropane	<0.018	mg/kg	0.018	0.063	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.020	mg/kg	0.020	0.067	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
2,2-Dichloropropane	<0.028	mg/kg	0.028	0.092	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
2-Butanone	<0.53	mg/kg	0.53	1.6	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
2-Chlorotoluene	<0.024	mg/kg	0.024	0.078	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
2-Hexanone	<0.26	mg/kg	0.26	0.92	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.020	mg/kg	0.020	0.064	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.24	mg/kg	0.24	0.80	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Acetone	<0.53	mg/kg	0.53	1.7	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Benzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromobenzene	<0.021	mg/kg	0.021	0.068	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromoform	<0.022	mg/kg	0.022	0.076	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromochloromethane	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromodichloromethane	<0.018	mg/kg	0.018	0.060	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromoform	<0.079	mg/kg	0.079	0.25	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Bromomethane	<0.12	mg/kg	0.12	0.39	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Carbon disulfide	<0.053	mg/kg	0.053	0.16	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Carbon tetrachloride	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Chlorobenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Chloroethane	<0.039	mg/kg	0.039	0.16	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Chloroform	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Chloromethane	<0.039	mg/kg	0.039	0.13	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.035	mg/kg	0.035	0.12	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.018	mg/kg	0.018	0.063	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Dibromochloromethane	<0.053	mg/kg	0.053	0.18	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Dibromomethane	<0.028	mg/kg	0.028	0.092	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Dichlorodifluoromethane	<0.066	mg/kg	0.066	0.22	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Diisopropyl ether	<0.024	mg/kg	0.024	0.080	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Ethylbenzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Hexachlorobutadiene	<0.030	mg/kg	0.030	0.10	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Isopropylbenzene	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
m & p-Xylene	<0.033	mg/kg	0.033	0.11	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530683	Sample Description: E510-4,S1,2'	Sampled: 02/02/2021 1340
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Methylene chloride	<0.079	mg/kg	0.079	0.28	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
n-Butylbenzene	<0.022	mg/kg	0.022	0.072	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
n-Propylbenzene	<0.017	mg/kg	0.017	0.055	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Naphthalene	<0.020	mg/kg	0.020	0.064	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
o-Xylene	<0.0092	mg/kg	0.0092	0.029	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
p-Isopropyltoluene	<0.017	mg/kg	0.017	0.058	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
sec-Butylbenzene	<0.014	mg/kg	0.014	0.046	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Styrene	<0.021	mg/kg	0.021	0.068	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
tert-Butylbenzene	<0.016	mg/kg	0.016	0.054	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Tetrachloroethene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Tetrahydrofuran	<0.33	mg/kg	0.33	1.1	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Toluene	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
trans-1,2-Dichloroethene	<0.018	mg/kg	0.018	0.062	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
trans-1,3-Dichloropropene	<0.053	mg/kg	0.053	0.16	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Trichloroethene	<0.025	mg/kg	0.025	0.081	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Trichlorofluoromethane	<0.053	mg/kg	0.053	0.16	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C
Vinyl chloride	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 16:47	RLD	EPA 8260C

#### Sub Lab Results

PFOA	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	attached	mg/kg	N/A	N/A	1		03/08/2021 00:00	SUB

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
CT LAB Sample#: 530684 Sample Description: E510-4,S3,10'										
Sampled: 02/02/2021 1350										
<b>Inorganic Results</b>										
Solids, Percent	97.7	%	0.1	0.1	1		02/04/2021 11:57	BMM	EPA 8000C	
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.072	mg/kg	0.072	0.24	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1,1-Trichloroethane	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.024	mg/kg	0.024	0.084	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1,2-Trichloroethane	<0.012	mg/kg	0.012	0.048	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1-Dichloroethane	<0.0084	mg/kg	0.0084	0.028	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1-Dichloroethene	<0.025	mg/kg	0.025	0.086	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,1-Dichloropropene	<0.036	mg/kg	0.036	0.11	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2,3-Trichlorobenzene	<0.013	mg/kg	0.013	0.045	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2,3-Trichloropropane	<0.048	mg/kg	0.048	0.17	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2,4-Trichlorobenzene	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2,4-Trimethylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.084	mg/kg	0.084	0.29	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2-Dibromoethane	<0.012	mg/kg	0.012	0.048	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2-Dichlorobenzene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2-Dichloroethane	<0.027	mg/kg	0.027	0.089	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,2-Dichloropropane	<0.031	mg/kg	0.031	0.10	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,3,5-Trimethylbenzene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,3-Dichlorobenzene	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,3-Dichloropropane	<0.017	mg/kg	0.017	0.058	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
1,4-Dichlorobenzene	<0.018	mg/kg	0.018	0.062	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
2,2-Dichloropropane	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
2-Butanone	<0.48	mg/kg	0.48	1.4	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
2-Chlorotoluene	<0.022	mg/kg	0.022	0.071	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
2-Hexanone	<0.24	mg/kg	0.24	0.84	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
4-Chlorotoluene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
4-Methyl-2-pentanone	<0.22	mg/kg	0.22	0.74	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Acetone	<0.48	mg/kg	0.48	1.6	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Benzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Bromobenzene	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Bromochloromethane	<0.021	mg/kg	0.021	0.070	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Bromodichloromethane	<0.017	mg/kg	0.017	0.056	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Bromoform	<0.072	mg/kg	0.072	0.23	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Bromomethane	<0.11	mg/kg	0.11	0.36	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Carbon disulfide	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Carbon tetrachloride	<0.017	mg/kg	0.017	0.054	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Chlorobenzene	<0.012	mg/kg	0.012	0.039	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Chloroethane	<0.036	mg/kg	0.036	0.14	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Chloroform	<0.019	mg/kg	0.019	0.064	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Chloromethane	<0.036	mg/kg	0.036	0.12	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
cis-1,2-Dichloroethene	<0.033	mg/kg	0.033	0.11	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
cis-1,3-Dichloropropene	<0.017	mg/kg	0.017	0.058	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Dibromochloromethane	<0.048	mg/kg	0.048	0.17	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Dibromomethane	<0.025	mg/kg	0.025	0.084	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Dichlorodifluoromethane	<0.060	mg/kg	0.060	0.21	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Diisopropyl ether	<0.022	mg/kg	0.022	0.074	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C
Ethylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530684 Sample Description: E510-4,S3,10'										Sampled: 02/02/2021 1350		
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method		
Hexachlorobutadiene	<0.028	mg/kg	0.028	0.094	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Isopropylbenzene	<0.016	mg/kg	0.016	0.052	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
m & p-Xylene	<0.030	mg/kg	0.030	0.099	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Methyl tert-butyl ether	<0.019	mg/kg	0.019	0.064	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Methylene chloride	<0.072	mg/kg	0.072	0.25	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
n-Butylbenzene	<0.021	mg/kg	0.021	0.066	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
n-Propylbenzene	<0.016	mg/kg	0.016	0.051	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Naphthalene	<0.018	mg/kg	0.018	0.059	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
o-Xylene	<0.0084	mg/kg	0.0084	0.027	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
p-Isopropyltoluene	<0.016	mg/kg	0.016	0.053	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
sec-Butylbenzene	<0.013	mg/kg	0.013	0.042	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Styrene	<0.019	mg/kg	0.019	0.063	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
tert-Butylbenzene	<0.014	mg/kg	0.014	0.049	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Tetrachloroethene	<0.013	mg/kg	0.013	0.045	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Tetrahydrofuran	<0.30	mg/kg	0.30	1.0	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Toluene	<0.019	mg/kg	0.019	0.064	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
trans-1,2-Dichloroethene	<0.017	mg/kg	0.017	0.057	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
trans-1,3-Dichloropropene	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Trichloroethene	<0.023	mg/kg	0.023	0.075	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Trichlorofluoromethane	<0.048	mg/kg	0.048	0.14	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
Vinyl chloride	<0.023	mg/kg	0.023	0.077	1		02/04/2021 13:30	02/05/2021 17:18	RLD	EPA 8260C		
<b>Sub Lab Results</b>												
PFOA	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			
PFOS	attached	mg/kg	N/A	N/A	1			03/08/2021 00:00	SUB			

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530685	Sample Description: E510-4	Sampled: 02/02/2021 1435
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1		02/09/2021 19:48	DGS	EPA 8260C	
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1		02/09/2021 19:48	DGS	EPA 8260C	
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1		02/09/2021 19:48	DGS	EPA 8260C	
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1		02/09/2021 19:48	DGS	EPA 8260C	
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1		02/09/2021 19:48	DGS	EPA 8260C	
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1		02/09/2021 19:48	DGS	EPA 8260C	
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1		02/09/2021 19:48	DGS	EPA 8260C	
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1		02/09/2021 19:48	DGS	EPA 8260C	
2-Butanone	<2.6	ug/L	2.6	8.8	1		02/09/2021 19:48	DGS	EPA 8260C	
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1		02/09/2021 19:48	DGS	EPA 8260C	
2-Hexanone	<3.0	ug/L	3.0	10	1		02/09/2021 19:48	DGS	EPA 8260C	

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 19:48	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 19:48	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 19:48	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:48	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 19:48	DGS	EPA 8260C
Bromochloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 19:48	DGS	EPA 8260C
Bromodichloromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:48	DGS	EPA 8260C
Bromoform	<0.90	ug/L	0.90	3.1	1			02/09/2021 19:48	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 19:48	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 19:48	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 19:48	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 19:48	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 19:48	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 19:48	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:48	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 19:48	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:48	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 19:48	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530685	Sample Description: E510-4	Sampled: 02/02/2021 1435
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Methylene chloride	<0.40	ug/L	0.40	1.5	1			02/09/2021 19:48	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 19:48	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 19:48	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 19:48	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:48	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 19:48	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 19:48	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 19:48	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 19:48	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 19:48	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 19:48	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 19:48	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 19:48	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 19:48	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 19:48	DGS	EPA 8260C
<b>Sub Lab Results</b>										
PFOA	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	
PFOS	attached	ug/L	N/A	N/A	1			03/08/2021 00:00	SUB	

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#: 530686	Sample Description: PUMP BLANK	Sampled: 02/02/2021 1500
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
<b>Organic Results</b>										
1,1,1,2-Tetrachloroethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 12:58	DGS	EPA 8260C
1,1,1-Trichloroethane	<0.29	ug/L	0.29	0.98	1			02/09/2021 12:58	DGS	EPA 8260C
1,1,2,2-Tetrachloroethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
1,1,2-Trichloroethane	<0.30	ug/L	0.30	0.99	1			02/09/2021 12:58	DGS	EPA 8260C
1,1-Dichloroethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
1,1-Dichloroethene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
1,1-Dichloropropene	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:58	DGS	EPA 8260C
1,2,3-Trichlorobenzene	<0.23	ug/L	0.23	0.77	1			02/09/2021 12:58	DGS	EPA 8260C
1,2,3-Trichloropropane	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
1,2,4-Trichlorobenzene	<0.28	ug/L	0.28	0.93	1			02/09/2021 12:58	DGS	EPA 8260C
1,2,4-Trimethylbenzene	<0.29	ug/L	0.29	0.96	1			02/09/2021 12:58	DGS	EPA 8260C
1,2-Dibromo-3-chloropropane	<0.25	ug/L	0.25	0.82	1			02/09/2021 12:58	DGS	EPA 8260C
1,2-Dibromoethane	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:58	DGS	EPA 8260C
1,2-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
1,2-Dichloroethane	<0.24	ug/L	0.24	0.81	1			02/09/2021 12:58	DGS	EPA 8260C
1,2-Dichloropropene	<0.18	ug/L	0.18	0.61	1			02/09/2021 12:58	DGS	EPA 8260C
1,3,5-Trimethylbenzene	<0.27	ug/L	0.27	0.89	1			02/09/2021 12:58	DGS	EPA 8260C
1,3-Dichlorobenzene	<0.26	ug/L	0.26	0.87	1			02/09/2021 12:58	DGS	EPA 8260C
1,3-Dichloropropane	<0.17	ug/L	0.17	0.57	1			02/09/2021 12:58	DGS	EPA 8260C
1,4-Dichlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
2,2-Dichloropropane	<0.30	ug/L	0.30	0.99	1			02/09/2021 12:58	DGS	EPA 8260C
2-Butanone	<2.6	ug/L	2.6	8.8	1			02/09/2021 12:58	DGS	EPA 8260C
2-Chlorotoluene	<0.25	ug/L	0.25	0.84	1			02/09/2021 12:58	DGS	EPA 8260C
2-Hexanone	<3.0	ug/L	3.0	10	1			02/09/2021 12:58	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
4-Chlorotoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
4-Methyl-2-pentanone	<2.2	ug/L	2.2	7.4	1			02/09/2021 12:58	DGS	EPA 8260C
Acetone	<4.0	ug/L	4.0	12	1			02/09/2021 12:58	DGS	EPA 8260C
Benzene	<0.40	ug/L	0.40	1.4	1			02/09/2021 12:58	DGS	EPA 8260C
Bromobenzene	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:58	DGS	EPA 8260C
Bromoform	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:58	DGS	EPA 8260C
Bromochloromethane	<0.29	ug/L	0.29	0.95	1			02/09/2021 12:58	DGS	EPA 8260C
Bromodichloromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:58	DGS	EPA 8260C
Bromoform	<0.90	ug/L	0.90	3.1	1			02/09/2021 12:58	DGS	EPA 8260C
Carbon disulfide	<0.60	ug/L	0.60	1.9	1			02/09/2021 12:58	DGS	EPA 8260C
Carbon tetrachloride	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Chlorobenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Chloroethane	<0.50	ug/L	0.50	1.6	1			02/09/2021 12:58	DGS	EPA 8260C
Chloroform	<0.30	ug/L	0.30	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
Chloromethane	<0.60	ug/L	0.60	2.1	1			02/09/2021 12:58	DGS	EPA 8260C
cis-1,2-Dichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
cis-1,3-Dichloropropene	<0.16	ug/L	0.16	0.54	1			02/09/2021 12:58	DGS	EPA 8260C
Dibromochloromethane	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Dibromomethane	<0.22	ug/L	0.22	0.73	1			02/09/2021 12:58	DGS	EPA 8260C
Dichlorodifluoromethane	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:58	DGS	EPA 8260C
Diisopropyl ether	<0.40	ug/L	0.40	1.3	1			02/09/2021 12:58	DGS	EPA 8260C
Ethylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Hexachlorobutadiene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
Isopropylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
m & p-Xylene	<0.70	ug/L	0.70	2.4	1			02/09/2021 12:58	DGS	EPA 8260C

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

CT LAB Sample#:	530686	Sample Description:	PUMP BLANK	Sampled:	02/02/2021 1500
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Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date/Time	Analysis Date/Time	Analyst	Method
Methyl tert-butyl ether	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Methylene chloride	<b>1.1</b>	ug/L	0.40 *	1.5	1			02/09/2021 12:58	DGS	EPA 8260C
n-Butylbenzene	<0.29	ug/L	0.29	0.98	1			02/09/2021 12:58	DGS	EPA 8260C
n-Propylbenzene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Naphthalene	<0.30	ug/L	0.30	1.0	1			02/09/2021 12:58	DGS	EPA 8260C
o-Xylene	<0.26	ug/L	0.26	0.88	1			02/09/2021 12:58	DGS	EPA 8260C
p-Isopropyltoluene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
sec-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
Styrene	<0.29	ug/L	0.29	0.95	1			02/09/2021 12:58	DGS	EPA 8260C
tert-Butylbenzene	<0.40	ug/L	0.40	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
Tetrachloroethene	<0.27	ug/L	0.27	0.89	1			02/09/2021 12:58	DGS	EPA 8260C
Tetrahydrofuran	<3.0	ug/L	3.0	10	1			02/09/2021 12:58	DGS	EPA 8260C
Toluene	<0.21	ug/L	0.21	0.69	1			02/09/2021 12:58	DGS	EPA 8260C
trans-1,2-Dichloroethene	<0.30	ug/L	0.30	1.2	1			02/09/2021 12:58	DGS	EPA 8260C
trans-1,3-Dichloropropene	<0.23	ug/L	0.23	0.77	1			02/09/2021 12:58	DGS	EPA 8260C
Trichloroethene	<0.30	ug/L	0.30	1.1	1			02/09/2021 12:58	DGS	EPA 8260C
Trichlorofluoromethane	<0.40	ug/L	0.40	1.4	1			02/09/2021 12:58	DGS	EPA 8260C
Vinyl chloride	<0.14	ug/L	0.14	0.46	1			02/09/2021 12:58	DGS	EPA 8260C

#### Sub Lab Results

PFOA	<b>attached</b>	ug/L	N/A	N/A	1		03/08/2021 00:00	SUB
PFOS	<b>attached</b>	ug/L	N/A	N/A	1		03/08/2021 00:00	SUB

Unless specifically stated to the contrary, soil/sediment/sludge sample results/LOD/LOQ/RRLs were reported on a Dry Weight Basis

**Notes regarding entire Chain of Custody:**

Notes: \* Indicates a value in between the LOD (limit of detection) and the LOQ (limit of quantitation). All LOD/LOQs are adjusted to reflect dilution and also any differences in the sample weight / volume as compared to standard amounts.

All samples were received intact and properly preserved unless otherwise noted. The results reported relate only to the samples tested. This report shall not be reproduced, except in full, without written approval of this laboratory. The Chain of Custody is attached.

Submitted by:  
 Eric T. Korthals  
 Project Manager  
 608-356-2760

**QC Qualifiers**

<b>Code</b>	<b>Description</b>
B	Analyte detected in the associated Method Blank.
C	Toxicity present in BOD sample.
D	Diluted Out.
E	Safe, No Total Coliform detected.
F	Unsafe, Total Coliform detected, no E. Coli detected.
G	Unsafe, Total Coliform detected and E. Coli detected.
H	Holding time exceeded.
I	Incubator temperature was outside acceptance limits during test period.
J	Estimated value.
L	Significant peaks were detected outside the chromatographic window.
M	Matrix spike and/or Matrix Spike Duplicate recovery outside acceptance limits.
N	Insufficient BOD oxygen depletion.
O	Complete BOD oxygen depletion.
P	Concentration of analyte differs more than 40% between primary and confirmation analysis.
Q	Laboratory Control Sample outside acceptance limits.
R	See Narrative at end of report.
S	Surrogate standard recovery outside acceptance limits due to apparent matrix effects.
T	Sample received with improper preservation or temperature.
U	Analyte concentration was below detection limit.
V	Raised Quantitation or Reporting Limit due to limited sample amount or dilution for matrix background interference.
W	Sample amount received was below program minimum.
X	Analyte exceeded calibration range.
Y	Replicate/Duplicate precision outside acceptance limits.
Z	Specified calibration criteria was not met.

**Current CT Laboratories Certifications**  
 Wisconsin (WDNR) Chemistry ID# 157066030  
 Wisconsin (DATCP) Bacteriology ID# 289  
 Louisiana NELAP (primary) ID# ACC20190002  
 Illinois NELAP Lab ID# 200073  
 Kansas NELAP Lab ID# E-10368  
 Virginia NELAP Lab ID# 460203  
 ISO/IEC 17025-2005 A2LA Cert # 3806.01  
 DoD-ELAP A2LA 3806.01  
 GA EPD Stipulation ID ACC20190002



March 05, 2021

**Vista Work Order No. 2102109**

Mr. Dennis Linley  
C T Laboratories  
1230 Lange Court  
Baraboo, WI 53913-3109

Dear Mr. Linley,

Enclosed are the results for the sample set received at Vista Analytical Laboratory on February 05, 2021 under your Project Name 'TRUAX FIELD / 159556 VISTA'.

Vista Analytical Laboratory is committed to serving you effectively. If you require additional information, please contact me at 916-673-1520 or by email at [mmaier@vista-analytical.com](mailto:mmaier@vista-analytical.com).

Thank you for choosing Vista as part of your analytical support team.

Sincerely,

Martha Maier  
Laboratory Director



*Vista Analytical Laboratory certifies that the report herein meets all the requirements set forth by NELAP for those applicable test methods. Results relate only to the samples as received by the laboratory. This report should not be reproduced except in full without the written approval of Vista.*

**Vista Work Order No. 2102109****Case Narrative****Sample Condition on Receipt:**

Nine soil samples and six groundwater samples were received and stored securely in accordance with Vista standard operating procedures and EPA methodology. The samples were received in good condition and within the recommended temperature requirements.

**Analytical Notes:****PFAS Isotope Dilution Method - Solid**

The soil samples were extracted and analyzed for a selected list of PFAS using Vista's Isotope Dilution Method. The results for PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Results for all other analytes include the linear isomers only.

**Holding Times**

The samples were extracted and analyzed within the hold times.

**Quality Control**

The Initial Calibration and Continuing Calibration Verifications met the method acceptance criteria.

A Method Blank and Ongoing Precision and Recovery (OPR) sample were extracted and analyzed with the preparation batch. No analytes were detected in the Method Blank above the Reporting Limit (RL). The OPR recoveries were within the method acceptance criteria.

As requested, an MS/MSD was performed on sample "E510-1,S1,2". The MS/MSD recoveries and/or RPDs were out of the acceptance criteria for PFPeS, PFNS and EtFOSA.

The labeled standard recoveries outside the acceptance criteria are flagged with an "H" qualifier. The responses of the internal standards with low recoveries were greater than 10:1 signal-to-noise, which is the limit generally considered acceptable for accurate quantitation by isotope dilution analysis.

**PFAS Isotope Dilution Method - Aqueous**

The groundwater samples were extracted and analyzed for a selected list of PFAS using Vista's PFAS Isotope Dilution Method. The results for PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Results for all other analytes include the linear isomers only.

**Holding Times**

The samples were extracted and analyzed within the hold times. The samples were re-extracted outside of the hold time.

### Quality Control

The Initial Calibration and Continuing Calibration Verifications met the acceptance criteria.

A Method Blank and Ongoing Precision and Recovery (OPR) sample were extracted and analyzed with the preparation batch. No analytes were detected in the Method Blank above the Reporting Limit. The OPR recoveries were within the method acceptance criteria.

The labeled standard recoveries for all QC and field samples were within the acceptance criteria.

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# Sample Inventory Report

Vista Sample ID	Client Sample ID	Sampled	Received	Components/Containers
2102109-01	E510-1,S1,2'	MS/MSD01-Feb-21 10:45	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-02	E510-1,S3,10'	01-Feb-21 11:25	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-03	E510-1, DUP	01-Feb-21 11:25	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-04	E510-2,S1,2'	01-Feb-21 11:55	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-05	E510-2,S3,10'	01-Feb-21 12:10	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-06	E510-3,S1,2'	01-Feb-21 12:30	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-07	E510-3,S2,9 1/2'	01-Feb-21 12:40	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-08	E510-3	01-Feb-21 14:05	05-Feb-21 09:40	HDPE Bottle, 125 mL
				HDPE Bottle, 125 mL
2102109-09	E510-1	01-Feb-21 14:50	05-Feb-21 09:40	HDPE Bottle, 250 mL
				HDPE Bottle, 250 mL
2102109-10	E510-1 DUP	01-Feb-21 14:50	05-Feb-21 09:40	HDPE Bottle, 250 mL
				HDPE Bottle, 250 mL
2102109-11	E510-2	01-Feb-21 16:05	05-Feb-21 09:40	HDPE Bottle, 250 mL
				HDPE Bottle, 250 mL
2102109-12	E510-4,S1,2'	02-Feb-21 13:40	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-13	E510-4,S3,10'	02-Feb-21 13:50	05-Feb-21 09:40	HDPE Jar, 6 oz
2102109-14	E510-4	02-Feb-21 14:35	05-Feb-21 09:40	HDPE Bottle, 250 mL
				HDPE Bottle, 250 mL
2102109-15	PUMP BLANK	02-Feb-21 15:00	05-Feb-21 09:40	HDPE Bottle, 250 mL
				HDPE Bottle, 250 mL

## **ANALYTICAL RESULTS**

Sample ID: Method Blank								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Solid	Lab Sample:	B1B0105-BLK1	Column:	BEH C18				
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.266	0.266	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFPeA	2706-90-3	<0.252	0.252	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFBS	375-73-5	<0.438	0.438	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
4:2 FTS	757124-72-4	<0.416	0.416	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFHxA	307-24-4	<0.638	0.638	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFPeS	2706-91-4	<0.324	0.324	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
HFPO-DA	13252-13-6	<0.548	0.548	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFHpA	375-85-9	<0.332	0.332	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
ADONA	919005-14-4	<0.350	0.350	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFHxS	355-46-4	<0.408	0.408	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
6:2 FTS	27619-97-2	<0.648	0.648	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFOA	335-67-1	<0.288	0.288	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFHpS	375-92-8	<0.630	0.630	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFNA	375-95-1	<0.376	0.376	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFOSA	754-91-6	<0.452	0.452	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFOS	1763-23-1	<0.764	0.764	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
9Cl-PF3ONS	756426-58-1	<0.714	0.714	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFDA	335-76-2	<0.652	0.652	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
8:2 FTS	39108-34-4	<0.538	0.538	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFNS	68259-12-1	<0.622	0.622	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
MeFOSAA	2355-31-9	<0.384	0.384	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
EtFOSAA	2991-50-6	<0.704	0.704	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFUnA	2058-94-8	<0.312	0.312	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFDS	335-77-3	<0.752	0.752	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
11Cl-PF3OUdS	763051-92-9	<1.13	1.13	1.50		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
10:2 FTS	120226-60-0	<0.522	0.522	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFDoA	307-55-1	<0.408	0.408	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
MeFOSA	31506-32-8	<3.16	3.16	10.0		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFTrDA	72629-94-8	<0.618	0.618	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFDoS	79780-39-5	<1.01	1.01	1.50		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFTeDA	376-06-7	<0.608	0.608	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
EtFOSE	4151-50-2	<5.00	5.00	10.0		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFHxDA	67905-19-5	<0.250	0.250	0.500		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
PFODA	16517-11-6	<0.970	0.970	1.00		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
MeFOSE	24448-09-7	<3.08	3.08	10.0		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
EtFOSE	1691-99-2	<3.52	3.52	10.0		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	
Labeled Standards		Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFBA	159556 - Page 57 of 121	IS	82.1	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1	

Sample ID: Method Blank								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Solid	Lab Sample:	B1B0105-BLK1	Column:	BEH C18				
Project:	TRUAX FIELD / 159556 VISTA										
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFPcA	IS	74.9	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C3-PFBS	IS	81.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C3-HFPO-DA	IS	74.1	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-4:2 FTS	IS	82.0	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFHxA	IS	75.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C4-PFHpA	IS	79.9	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C3-PFHxS	IS	84.9	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-6:2 FTS	IS	79.3	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C5-PFNA	IS	75.1	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C8-PFOSA	IS	33.1	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFOA	IS	78.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C8-PFOS	IS	76.5	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFDA	IS	62.8	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-8:2 FTS	IS	78.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d3-MeFOSAA	IS	53.3	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFUnA	IS	56.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d5-EtFOSAA	IS	53.4	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-10:2 FTS	IS	67.3	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFDaA	IS	59.3	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d3-MeFOSA	IS	6.70	10 - 150	H	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFTeDA	IS	62.9	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d5-EtFOSA	IS	6.10	10 - 150	H	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
13C2-PFHxDA	IS	76.4	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d7-MeFOSE	IS	25.3	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		
d9-EtFOSE	IS	26.2	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:00	1		

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
 The sample size is reported in wet weight.  
 Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: OPR											PFAS Isotope Dilution Method			
Client Data				Laboratory Data										
Name:	C T Laboratories	Matrix:	Solid	Lab Sample:			B1B0105-BS1		Column:	BEH C18				
Project:	TRUAX FIELD / 159556 VISTA													
Analyte	CAS Number	Amt Found (ng/g)	Spike Amt	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
PFBA	375-22-4	1.99	2.00	99.5	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFPeA	2706-90-3	2.22	2.00	111	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFBS	375-73-5	2.30	2.00	115	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
4:2 FTS	757124-72-4	2.11	2.00	105	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFHxA	307-24-4	2.15	2.00	107	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFPeS	2706-91-4	2.15	2.00	108	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
HFPO-DA	13252-13-6	2.11	2.00	106	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFHpA	375-85-9	2.04	2.00	102	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
ADONA	919005-14-4	2.07	2.00	103	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFHxS	355-46-4	2.00	2.00	99.9	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
6:2 FTS	27619-97-2	2.34	2.00	117	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFOA	335-67-1	2.10	2.00	105	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFHpS	375-92-8	2.23	2.00	112	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFNA	375-95-1	2.13	2.00	107	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFOSA	754-91-6	2.33	2.00	116	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFOS	1763-23-1	2.08	2.00	104	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
9Cl-PF3ONS	756426-58-1	2.02	2.00	101	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFDA	335-76-2	2.19	2.00	109	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
8:2 FTS	39108-34-4	2.19	2.00	110	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFNS	68259-12-1	1.45	2.00	72.4	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
MeFOSAA	2355-31-9	2.06	2.00	103	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
EtFOSAA	2991-50-6	2.21	2.00	111	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFUnA	2058-94-8	2.29	2.00	114	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFDS	335-77-3	1.89	2.00	94.6	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
11Cl-PF3OUdS	763051-92-9	2.31	2.00	115	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
10:2 FTS	120226-60-0	2.10	2.00	105	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFDoA	307-55-1	2.09	2.00	105	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
MeFOSA	31506-32-8	1.09	2.00	54.7	50 - 150	J	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFTrDA	72629-94-8	2.01	2.00	101	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFDoS	79780-39-5	2.21	2.02	110	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFTeDA	376-06-7	2.01	2.00	101	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
EtFOSA	4151-50-2	1.60	2.00	80.2	50 - 150	J, Q	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFHxDA	67905-19-5	1.93	2.00	96.3	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
PFODA	159556 - Page 59 of 121	1.68	2.00	83.8	50 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			

Sample ID: OPR											PFAS Isotope Dilution Method			
Client Data				Laboratory Data										
Name:	C T Laboratories	Matrix:	Solid	Lab Sample:			B1B0105-BS1	Column:	BEH C18					
Project:	TRUAX FIELD / 159556 VISTA													
Analyte	CAS Number	Amt Found (ng/g)	Spike Amt	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
MeFOSE	24448-09-7	1.17	2.00	58.5	50 - 150	J	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
EtFOSE	1691-99-2	1.50	2.00	75.1	50 - 150	J	B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1			
Labeled Standards	Type	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution					
13C3-PFBA	IS	92.8	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C3-PFPeA	IS	84.3	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C3-PFBS	IS	86.6	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C3-HFPO-DA	IS	81.8	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-4:2 FTS	IS	92.8	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFHxA	IS	83.0	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C4-PFHpA	IS	88.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C3-PFHxS	IS	87.1	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-6:2 FTS	IS	90.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C5-PFNA	IS	79.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C8-PFOSA	IS	33.4	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFOA	IS	86.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C8-PFOS	IS	79.5	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFDA	IS	61.8	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-8:2 FTS	IS	75.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d3-MeFOSAA	IS	61.4	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFUnA	IS	53.2	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d5-EtFOSAA	IS	57.6	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-10:2 FTS	IS	73.5	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFDaO	IS	58.9	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d3-MeFOSA	IS	15.4	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFTeDA	IS	66.6	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d5-EtFOSA	IS	14.1	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
13C2-PFHxDA	IS	71.7	25 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d7-MeFOSE	IS	30.4	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					
d9-EtFOSE	IS	33.5	10 - 150		B1B0105	18-Feb-21	1.00 g	23-Feb-21 21:10	1					

**Sample ID: E510-1,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data								
Name:	C T Laboratories <th>Matrix:</th> <td>Soil<th>Lab Sample:</th><td>2102109-01</td><th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>01-Feb-21 10:45<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td>	Matrix:	Soil <th>Lab Sample:</th> <td>2102109-01</td> <th>Column:</th> <td>BEH C18</td> <th>Date Collected:</th> <td>01-Feb-21 10:45<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td>	Lab Sample:	2102109-01	Column:	BEH C18	Date Collected:	01-Feb-21 10:45 <th>Date Received:</th> <td>05-Feb-21 09:40<th>% Solids:</th></td>	Date Received:	05-Feb-21 09:40 <th>% Solids:</th>	% Solids:
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
PFBA	375-22-4	<0.254	0.254	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFPeA	2706-90-3	<0.241	0.241	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFBS	375-73-5	<0.418	0.418	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
4:2 FTS	757124-72-4	<0.397	0.397	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFHxA	307-24-4	<0.609	0.609	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFPeS	2706-91-4	<0.309	0.309	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
HFPO-DA	13252-13-6	<0.523	0.523	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFHpA	375-85-9	<0.317	0.317	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
ADONA	919005-14-4	<0.334	0.334	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFHxS	355-46-4	0.445	0.389	0.477	J, Q	B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
6:2 FTS	27619-97-2	<0.619	0.619	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFOA	335-67-1	<0.275	0.275	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFHpS	375-92-8	<0.601	0.601	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFNA	375-95-1	<0.359	0.359	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFOSA	754-91-6	<0.431	0.431	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFOS	1763-23-1	<0.729	0.729	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
9Cl-PF3ONS	756426-58-1	<0.682	0.682	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFDA	335-76-2	<0.622	0.622	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
8:2 FTS	39108-34-4	<0.514	0.514	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFNS	68259-12-1	<0.594	0.594	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
MeFOSAA	2355-31-9	<0.367	0.367	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
EtFOSAA	2991-50-6	<0.672	0.672	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFUnA	2058-94-8	<0.298	0.298	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFDS	335-77-3	<0.718	0.718	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
11Cl-PF3OUdS	763051-92-9	<1.08	1.08	1.43		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
10:2 FTS	120226-60-0	<0.498	0.498	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFDoA	307-55-1	<0.389	0.389	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
MeFOSA	31506-32-8	<3.02	3.02	9.55		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFTrDA	72629-94-8	<0.590	0.590	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFDoS	79780-39-5	<0.962	0.962	1.43		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFTeDA	376-06-7	<0.580	0.580	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
EtFOSE	4151-50-2	<4.77	4.77	9.55		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFHxDA	67905-19-5	<0.239	0.239	0.477		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
PFODA	16517-11-6	<0.926	0.926	0.955		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
MeFOSE	24448-09-7	<2.94	2.94	9.55		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
EtFOSE	1691-99-2	<3.36	3.36	9.55		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1		
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
13C3-PFBA	IS	85.0	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1			

**Sample ID: E510-1,S1,2'**
**PFAS Isotope Dilution Method**
**Client Data**

Name: C T Laboratories  
 Project: TRUAX FIELD / 159556 VISTA  
 Location: 530671

Matrix: Soil  
 Date Collected: 01-Feb-21 10:45

**Laboratory Data**

Lab Sample: 2102109-01  
 Date Received: 05-Feb-21 09:40  
 % Solids: 88.0

Column: BEH C18

**Labeled Standards**
**Type**
**% Recovery**
**Limits**
**Qualifiers**
**Batch**
**Extracted**
**Samp Size**
**Analyzed**
**Dilution**

13C3-PFPcA	IS	81.5	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C3-PFBS	IS	90.2	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C3-HFPO-DA	IS	72.0	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-4:2 FTS	IS	81.1	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFHxA	IS	82.1	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C4-PFHxA	IS	82.8	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C3-PFHxS	IS	82.9	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-6:2 FTS	IS	86.9	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C5-PFNA	IS	78.7	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C8-PFOSA	IS	54.1	10 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFOA	IS	77.5	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C8-PFOS	IS	79.5	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFDA	IS	69.7	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-8:2 FTS	IS	76.8	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d3-MeFOSAA	IS	72.1	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFUnA	IS	66.9	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d5-EtFOSAA	IS	64.6	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-10:2 FTS	IS	92.2	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFDmA	IS	68.1	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d3-MeFOSA	IS	22.4	10 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFTeDA	IS	60.9	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d5-EtFOSA	IS	19.8	10 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
13C2-PFHxDA	IS	34.4	25 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d7-MeFOSE	IS	44.6	10 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1
d9-EtFOSE	IS	56.4	10 - 150		B1B0105	18-Feb-21	1.19 g	22-Feb-21 20:29	1

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
 The sample size is reported in wet weight.  
 Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

**Sample ID: E510-1,S1,2'**
**PFAS Isotope Dilution Method**

Name:	C T Laboratories	Lab Sample: B1B0105-MS1/B1B0105-MSD1										Source Lab Sample: 2102109-01					
Project:	TRUAX FIELD / 159556 VISTA	QC Batch: B1B0105										Date Extracted: 18-Feb-21					
Matrix:	Solid	Samp Size: 1.15/1.16 g										Column: BEH C18					
Analyte	CAS Number	Sample (ng/g)	MS (ng/g)	MS Spike	MS % Rec	MS Quals	MSD (ng/g)	MSD Spike	MSD % Rec	RPD	MSD Quals	%Rec Limits	RPD Limits	MS Analyzed	MS Dil	MSD Analyzed	MSD Dil
PFBA	375-22-4	ND	2.22	1.98	112		2.08	1.96	106	5.50		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFPeA	2706-90-3	ND	2.21	1.98	112		2.08	1.96	106	5.50		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFBS	375-73-5	ND	2.48	1.98	125		2.23	1.96	114	9.21		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
4:2 FTS	757124-72-4	ND	2.02	1.98	102		2.09	1.96	107	4.78		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFHxA	307-24-4	ND	2.14	1.98	108		2.26	1.96	115	6.28		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFPeS	2706-91-4	ND	2.05	1.98	104		2.61	1.96	133	24.5	H	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
HFPO-DA	13252-13-6	ND	2.07	1.98	104	Q	1.92	1.96	98.1	5.84		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFHpA	375-85-9	ND	2.19	1.98	111		2.18	1.96	111	0		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
ADONA	919005-14-4	ND	2.20	1.98	111		2.11	1.96	108	2.74		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFHxS	355-46-4	0.445	2.42	1.98	99.6		2.25	1.96	92.1	7.82		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
6:2 FTS	27619-97-2	ND	1.83	1.98	92.4		2.48	1.96	126	30.8		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFOA	335-67-1	ND	2.48	1.98	120		2.39	1.96	116	3.39		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFHps	375-92-8	ND	2.13	1.98	108		2.12	1.96	108	0		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFNA	375-95-1	ND	2.22	1.98	112		2.36	1.96	120	6.90		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFOSA	754-91-6	ND	2.53	1.98	128		2.41	1.96	123	3.98		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFOS	1763-23-1	ND	2.26	1.98	98.8		2.41	1.96	107	7.97		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
9Cl-PF3ONS	756426-58-1	ND	2.29	1.98	116	Q	2.03	1.96	103	11.9		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFDA	335-76-2	ND	2.28	1.98	115		2.14	1.96	109	5.36		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
8:2 FTS	39108-34-4	ND	2.52	1.98	127		1.96	1.96	99.9	23.9		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFNS	68259-12-1	ND	2.01	1.98	102		1.31	1.96	66.9	41.6	H	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
MeFOSAA	2355-31-9	ND	1.82	1.98	91.7		1.77	1.96	90.4	1.43		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
EtFOSAA	2991-50-6	ND	2.10	1.98	106		1.55	1.96	79.1	29.1		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFUnA	2058-94-8	ND	2.18	1.98	110		2.45	1.96	125	12.8		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFDS	335-77-3	ND	2.32	1.98	117		1.65	1.96	84.0	32.8		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
11Cl-PF3OUdS	763051-92-9	ND	2.48	1.98	125	Q	2.42	1.96	123	1.61		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
10:2 FTS	120226-60-0	ND	1.98	1.98	99.8		2.42	1.96	124	21.6		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFDoA	307-55-1	ND	1.89	1.98	95.3		1.87	1.96	95.3	0		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
MeFOSA	31506-32-8	ND	1.45	1.98	73.1	J	1.87	1.96	95.5	26.6	J, Q	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PTFrDA	72629-94-8	ND	2.07	1.98	105		2.31	1.96	118	11.7	Q	60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFDoS	79780-39-5	ND	1.96	2.00	97.9		2.12	1.98	107	8.88		60-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFTeDA	376-06-7	ND	2.26	1.98	114	Q	2.04	1.96	104	9.17		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
EtFOSA	4151-50-2	ND	1.31	1.98	66.3	J, H	0.917	1.96	46.8	34.5	J, H, Q	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
PFHxDA	159556 - Page 63 of 121 67905-19-5	ND	2.30	1.98	116		2.06	1.96	105	9.95		70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1

**Sample ID: E510-1,S1,2'**
**PFAS Isotope Dilution Method**

Name:	C T Laboratories	Lab Sample:	B1B0105-MS1/B1B0105-MSD1							Source Lab Sample:	2102109-01						
Project:	TRUAX FIELD / 159556 VISTA	QC Batch:	B1B0105							Date Extracted:	18-Feb-21						
Matrix:	Solid	Samp Size:	1.15/1.16 g							Column:	BEH C18						
Analyte	CAS Number	Sample (ng/g)	MS (ng/g)	MS Spike	MS % Rec	MS Quals	MSD (ng/g)	MSD Spike	MSD % Rec	RPD	MSD Quals	%Rec Limits	RPD Limits	MS Analyzed	MS Dil	MSD Analyzed	MSD Dil
PFODA	16517-11-6	ND	1.73	1.98	87.3		1.61	1.96	82.2	6.02		40-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
MeFOSE	24448-09-7	ND	1.78	1.98	90.0	J	1.66	1.96	84.6	6.19	J	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
EtFOSE	1691-99-2	ND	1.62	1.98	81.8	J	1.68	1.96	85.6	4.54	J	70-130	50	22-Feb-21 20:08	1	22-Feb-21 20:18	1
Labeled Standards	Type		MS % Rec	MS Quals		MSD % Rec		MSD Quals			MS Analyzed	MS Limits	MSD Analyzed	MS Dil	MSD Analyzed	MSD Dil	
13C3-PFBA	IS		85.4			86.2				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C3-PFPeA	IS		82.9			83.4				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C3-PFBS	IS		91.1			83.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C3-HFPO-DA	IS		75.7			73.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-4:2 FTS	IS		88.5			91.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFHxA	IS		81.8			79.9				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C4-PFHxA	IS		84.4			82.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C3-PFHxS	IS		83.6			84.9				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-6:2 FTS	IS		86.3			90.5				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C5-PFNA	IS		76.8			73.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C8-PFOSA	IS		48.0			48.0				10 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFOA	IS		74.3			78.6				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C8-PFOS	IS		76.2			79.8				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFDA	IS		66.8			70.9				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-8:2 FTS	IS		81.7			79.3				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d3-MeFOSAA	IS		80.9			71.7				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFUnA	IS		68.8			67.0				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d5-EtFOSAA	IS		70.5			68.3				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-10:2 FTS	IS		88.0			72.4				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFDaA	IS		71.4			61.4				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d3-MeFOSA	IS		18.3			19.7				10 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFTeDA	IS		69.8			73.7				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d5-EtFOSA	IS		16.3			19.1				10 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
13C2-PFHxDA	IS		42.6			48.7				25 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d7-MeFOSE	IS		47.2			43.0				10 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			
d9-EtFOSE	IS		56.3			52.5				10 - 150	22-Feb-21 20:08	1	22-Feb-21 20:18	1			

Sample ID: E510-1,S3,10'								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Soil	Lab Sample: 2102109-02				Column: BEH C18			
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 11:25	Date Received: 05-Feb-21 09:40				% Solids: 88.8			
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.263	0.263	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFPeA	2706-90-3	<0.249	0.249	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFBS	375-73-5	<0.433	0.433	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
4:2 FTS	757124-72-4	<0.411	0.411	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFHxA	307-24-4	<0.630	0.630	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFPeS	2706-91-4	<0.320	0.320	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
HFPO-DA	13252-13-6	<0.541	0.541	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFHpA	375-85-9	<0.328	0.328	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
ADONA	919005-14-4	<0.346	0.346	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFHxS	355-46-4	<0.403	0.403	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
6:2 FTS	27619-97-2	<0.640	0.640	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFOA	335-67-1	<0.284	0.284	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFHpS	375-92-8	<0.622	0.622	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFNA	375-95-1	<0.371	0.371	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFOSA	754-91-6	<0.446	0.446	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFOS	1763-23-1	<0.755	0.755	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
9Cl-PF3ONS	756426-58-1	<0.705	0.705	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFDA	335-76-2	<0.644	0.644	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
8:2 FTS	39108-34-4	<0.531	0.531	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFNS	68259-12-1	<0.614	0.614	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
MeFOSAA	2355-31-9	<0.379	0.379	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
EtFOSAA	2991-50-6	<0.695	0.695	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFUnA	2058-94-8	<0.308	0.308	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFDS	335-77-3	<0.743	0.743	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
11Cl-PF3OUdS	763051-92-9	<1.11	1.11	1.48		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
10:2 FTS	120226-60-0	<0.516	0.516	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFDoA	307-55-1	<0.403	0.403	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
MeFOSA	31506-32-8	<3.12	3.12	9.88		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFTrDA	72629-94-8	<0.610	0.610	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFDoS	79780-39-5	<0.996	0.996	1.48		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFTeDA	376-06-7	<0.601	0.601	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
EtFOSE	4151-50-2	<4.94	4.94	9.88		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFHxDA	67905-19-5	<0.247	0.247	0.494		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
PFODA	16517-11-6	<0.958	0.958	0.988		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
MeFOSE	24448-09-7	<3.04	3.04	9.88		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
EtFOSE	1691-99-2	<3.48	3.48	9.88		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	82.9	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1		

**Sample ID: E510-1,S3,10'**
**PFAS Isotope Dilution Method**
**Client Data**

Name: C T Laboratories  
Project: TRUAX FIELD / 159556 VISTA  
Location: 530672

Matrix: Soil  
Date Collected: 01-Feb-21 11:25

**Laboratory Data**

Lab Sample: 2102109-02  
Date Received: 05-Feb-21 09:40  
% Solids: 88.8

Column: BEH C18

**Labeled Standards**
**Type**
**% Recovery**
**Limits**
**Qualifiers**
**Batch**
**Extracted**
**Samp Size**
**Analyzed**
**Dilution**

13C3-PFPcA	IS	80.3	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C3-PFBS	IS	89.4	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C3-HFPO-DA	IS	73.0	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-4:2 FTS	IS	82.1	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFHxA	IS	76.9	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C4-PFHxA	IS	75.7	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C3-PFHxS	IS	77.6	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-6:2 FTS	IS	91.3	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C5-PFNA	IS	74.3	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C8-PFOSA	IS	30.8	10 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFOA	IS	79.4	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C8-PFOS	IS	75.0	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFDA	IS	65.7	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-8:2 FTS	IS	75.1	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d3-MeFOSAA	IS	69.0	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFUnA	IS	53.7	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d5-EtFOSAA	IS	64.2	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-10:2 FTS	IS	63.9	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFDmA	IS	53.4	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d3-MeFOSA	IS	8.90	10 - 150	H	B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFTeDA	IS	63.6	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d5-EtFOSA	IS	8.00	10 - 150	H	B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
13C2-PFHxDA	IS	45.9	25 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d7-MeFOSE	IS	28.5	10 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1
d9-EtFOSE	IS	33.9	10 - 150		B1B0105	18-Feb-21	1.14 g	22-Feb-21 20:39	1

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-1, DUP								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:		2102109-03		Column:		BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 11:25	Date Received:		05-Feb-21 09:40		% Solids:		84.4	
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.260	0.260	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFPeA	2706-90-3	<0.247	0.247	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFBS	375-73-5	<0.429	0.429	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
4:2 FTS	757124-72-4	<0.407	0.407	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFHxA	307-24-4	<0.625	0.625	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFPeS	2706-91-4	<0.317	0.317	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
HFPO-DA	13252-13-6	<0.537	0.537	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFHpA	375-85-9	<0.325	0.325	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
ADONA	919005-14-4	<0.343	0.343	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFHxS	355-46-4	<0.400	0.400	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
6:2 FTS	27619-97-2	<0.635	0.635	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFOA	335-67-1	<0.282	0.282	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFHpS	375-92-8	<0.617	0.617	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFNA	375-95-1	<0.368	0.368	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFOSA	754-91-6	<0.443	0.443	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFOS	1763-23-1	<0.748	0.748	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
9Cl-PF3ONS	756426-58-1	<0.699	0.699	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFDA	335-76-2	<0.638	0.638	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
8:2 FTS	39108-34-4	<0.527	0.527	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFNS	68259-12-1	<0.609	0.609	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
MeFOSAA	2355-31-9	<0.376	0.376	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
EtFOSAA	2991-50-6	<0.689	0.689	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFUnA	2058-94-8	<0.306	0.306	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFDS	335-77-3	<0.736	0.736	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
11Cl-PF3OUdS	763051-92-9	<1.10	1.10	1.47		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
10:2 FTS	120226-60-0	<0.511	0.511	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFDoA	307-55-1	<0.400	0.400	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
MeFOSA	31506-32-8	<3.09	3.09	9.79		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFTrDA	72629-94-8	<0.605	0.605	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFDoS	79780-39-5	<0.987	0.987	1.47		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFTeDA	376-06-7	<0.595	0.595	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
EtFOSE	4151-50-2	<4.90	4.90	9.79		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFHxDa	67905-19-5	<0.245	0.245	0.490		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
PFODA	16517-11-6	<0.950	0.950	0.979		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
MeFOSE	24448-09-7	<3.02	3.02	9.79		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
EtFOSE	1691-99-2	<3.45	3.45	9.79		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	90.4	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1		

**Sample ID: E510-1, DUP**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-03	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 11:25 <th>% Solids:</th> <td>84.4</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	84.4					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	83.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C3-PFBS	IS	88.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C3-HFPO-DA	IS	73.3	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-4:2 FTS	IS	89.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFHxA	IS	83.0	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C4-PFHpA	IS	88.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C3-PFHxS	IS	87.9	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-6:2 FTS	IS	83.3	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C5-PFNA	IS	76.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C8-PFOSA	IS	36.3	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFOA	IS	79.0	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C8-PFOS	IS	80.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFDA	IS	67.5	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-8:2 FTS	IS	80.4	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d3-MeFOSAA	IS	65.3	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFUnA	IS	52.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d5-EtFOSAA	IS	57.4	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-10:2 FTS	IS	85.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFDaA	IS	51.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d3-MeFOSA	IS	12.2	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFTeDA	IS	63.7	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d5-EtFOSA	IS	11.0	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
13C2-PFHxDA	IS	46.1	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d7-MeFOSE	IS	28.9	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	
d9-EtFOSE	IS	32.5	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 20:50	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

**Sample ID: E510-2,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data								
Name:	C T Laboratories <th>Matrix:</th> <td>Soil<th>Lab Sample:</th><td>2102109-04<th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>01-Feb-21 11:55<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td></td>	Matrix:	Soil <th>Lab Sample:</th> <td>2102109-04<th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>01-Feb-21 11:55<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td>	Lab Sample:	2102109-04 <th>Column:</th> <td>BEH C18</td> <th>Date Collected:</th> <td>01-Feb-21 11:55<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td>	Column:	BEH C18	Date Collected:	01-Feb-21 11:55 <th>Date Received:</th> <td>05-Feb-21 09:40<th>% Solids:</th></td>	Date Received:	05-Feb-21 09:40 <th>% Solids:</th>	% Solids:
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
PFBA	375-22-4	<0.265	0.265	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFPeA	2706-90-3	<0.251	0.251	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFBS	375-73-5	<0.437	0.437	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
4:2 FTS	757124-72-4	<0.415	0.415	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFHxA	307-24-4	<0.636	0.636	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFPeS	2706-91-4	<0.323	0.323	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
HFPO-DA	13252-13-6	<0.547	0.547	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFHpA	375-85-9	<0.331	0.331	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
ADONA	919005-14-4	<0.349	0.349	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFHxS	355-46-4	<0.407	0.407	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
6:2 FTS	27619-97-2	<0.646	0.646	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFOA	335-67-1	<0.287	0.287	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFHpS	375-92-8	<0.629	0.629	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFNA	375-95-1	<0.375	0.375	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFOSA	754-91-6	<0.451	0.451	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFOS	1763-23-1	<0.762	0.762	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
9Cl-PF3ONS	756426-58-1	<0.712	0.712	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFDA	335-76-2	<0.650	0.650	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
8:2 FTS	39108-34-4	<0.537	0.537	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFNS	68259-12-1	<0.621	0.621	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
MeFOSAA	2355-31-9	<0.383	0.383	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
EtFOSAA	2991-50-6	<0.702	0.702	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFUnA	2058-94-8	<0.311	0.311	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFDS	335-77-3	<0.750	0.750	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
11Cl-PF3OUdS	763051-92-9	<1.13	1.13	1.50		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
10:2 FTS	120226-60-0	<0.521	0.521	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFDoA	307-55-1	<0.407	0.407	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
MeFOSA	31506-32-8	<3.15	3.15	9.98		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFTrDA	72629-94-8	<0.617	0.617	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFDoS	79780-39-5	<1.01	1.01	1.50		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFTeDA	376-06-7	<0.607	0.607	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
EtFOSE	4151-50-2	<4.99	4.99	9.98		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFHxDA	67905-19-5	<0.249	0.249	0.499		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
PFODA	16517-11-6	<0.968	0.968	0.998		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
MeFOSE	24448-09-7	<3.07	3.07	9.98		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
EtFOSE	1691-99-2	<3.51	3.51	9.98		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1		
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
13C3-PFBA	IS	87.1	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1			

**Sample ID: E510-2,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-04	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 11:55 <th>% Solids:</th> <td>88.7</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	88.7					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	83.2	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C3-PFBS	IS	92.0	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C3-HFPO-DA	IS	75.9	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-4:2 FTS	IS	84.1	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFHxA	IS	80.7	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C4-PFHxA	IS	85.8	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C3-PFHxS	IS	85.7	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-6:2 FTS	IS	97.0	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C5-PFNA	IS	72.1	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C8-PFOSA	IS	47.2	10 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFOA	IS	77.2	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C8-PFOS	IS	76.2	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFDA	IS	70.1	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-8:2 FTS	IS	83.7	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d3-MeFOSAA	IS	73.7	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFUnA	IS	66.0	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d5-EtFOSAA	IS	70.9	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-10:2 FTS	IS	88.1	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFDmA	IS	68.7	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d3-MeFOSA	IS	20.5	10 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFTeDA	IS	64.6	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d5-EtFOSA	IS	18.3	10 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
13C2-PFHxDA	IS	36.9	25 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d7-MeFOSE	IS	43.6	10 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	
d9-EtFOSE	IS	52.5	10 - 150		B1B0105	18-Feb-21	1.13 g	22-Feb-21 21:01	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-2,S3,10'										PFAS Isotope Dilution Method			
Client Data				Laboratory Data									
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-05	Column:	BEH C18						
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 12:10	Date Received:	05-Feb-21 09:40								
Location:	530675	% Solids:	95.5										
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
PFBA	375-22-4	<0.265	0.265	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFPeA	2706-90-3	<0.251	0.251	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFBS	375-73-5	<0.437	0.437	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
4:2 FTS	757124-72-4	<0.415	0.415	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFHxA	307-24-4	<0.636	0.636	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFPeS	2706-91-4	<0.323	0.323	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
HFPO-DA	13252-13-6	<0.546	0.546	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFHpA	375-85-9	<0.331	0.331	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
ADONA	919005-14-4	<0.349	0.349	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFHxS	355-46-4	<0.407	0.407	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
6:2 FTS	27619-97-2	<0.646	0.646	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFOA	335-67-1	<0.287	0.287	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFHpS	375-92-8	<0.628	0.628	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFNA	375-95-1	<0.375	0.375	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFOSA	754-91-6	<0.451	0.451	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFOS	1763-23-1	<0.762	0.762	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
9Cl-PF3ONS	756426-58-1	<0.712	0.712	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFDA	335-76-2	<0.650	0.650	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
8:2 FTS	39108-34-4	<0.536	0.536	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFNS	68259-12-1	<0.620	0.620	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
MeFOSAA	2355-31-9	<0.383	0.383	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
EtFOSAA	2991-50-6	<0.702	0.702	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFUnA	2058-94-8	<0.311	0.311	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFDS	335-77-3	<0.750	0.750	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
11Cl-PF3OUdS	763051-92-9	<1.12	1.12	1.50		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
10:2 FTS	120226-60-0	<0.521	0.521	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFDoA	307-55-1	<0.407	0.407	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
MeFOSA	31506-32-8	<3.15	3.15	9.97		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFTrDA	72629-94-8	<0.616	0.616	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFDoS	79780-39-5	<1.01	1.01	1.50		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFTeDA	376-06-7	<0.606	0.606	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
EtFOSE	4151-50-2	<4.99	4.99	9.97		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFHxDA	67905-19-5	<0.249	0.249	0.499		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
PFODA	16517-11-6	<0.967	0.967	0.997		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
MeFOSE	24448-09-7	<3.07	3.07	9.97		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
EtFOSE	1691-99-2	<3.51	3.51	9.97		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1			
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution				
13C3-PFBA	IS	79.6	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1				

**Sample ID: E510-2,S3,10'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-05	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 12:10 <th>% Solids:</th> <td>95.5</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	95.5					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	74.9	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C3-PFBS	IS	84.4	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C3-HFPO-DA	IS	67.2	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-4:2 FTS	IS	77.0	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFHxA	IS	77.2	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C4-PFHpA	IS	80.5	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C3-PFHxS	IS	75.7	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-6:2 FTS	IS	83.7	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C5-PFNA	IS	68.7	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C8-PFOSA	IS	34.9	10 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFOA	IS	73.4	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C8-PFOS	IS	69.2	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFDA	IS	58.9	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-8:2 FTS	IS	73.2	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d3-MeFOSAA	IS	57.6	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFUnA	IS	49.3	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d5-EtFOSAA	IS	54.3	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-10:2 FTS	IS	58.8	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFDaA	IS	51.0	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d3-MeFOSA	IS	14.3	10 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFTeDA	IS	64.7	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d5-EtFOSA	IS	13.1	10 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
13C2-PFHxDA	IS	54.8	25 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d7-MeFOSE	IS	30.5	10 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	
d9-EtFOSE	IS	36.4	10 - 150		B1B0105	18-Feb-21	1.05 g	22-Feb-21 21:43	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

**Sample ID: E510-3,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data								
Name:	C T Laboratories <th>Matrix:</th> <td>Soil<th>Lab Sample:</th><td>2102109-06</td><th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>01-Feb-21 12:30<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td>	Matrix:	Soil <th>Lab Sample:</th> <td>2102109-06</td> <th>Column:</th> <td>BEH C18</td> <th>Date Collected:</th> <td>01-Feb-21 12:30<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td>	Lab Sample:	2102109-06	Column:	BEH C18	Date Collected:	01-Feb-21 12:30 <th>Date Received:</th> <td>05-Feb-21 09:40<th>% Solids:</th></td>	Date Received:	05-Feb-21 09:40 <th>% Solids:</th>	% Solids:
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
PFBA	375-22-4	<0.259	0.259	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFPeA	2706-90-3	<0.246	0.246	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFBS	375-73-5	<0.427	0.427	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
4:2 FTS	757124-72-4	<0.406	0.406	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFHxA	307-24-4	<0.622	0.622	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFPeS	2706-91-4	<0.316	0.316	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
HFPO-DA	13252-13-6	<0.534	0.534	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFHpA	375-85-9	<0.324	0.324	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
ADONA	919005-14-4	<0.341	0.341	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFHxS	355-46-4	1.11	0.398	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
6:2 FTS	27619-97-2	<0.632	0.632	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFOA	335-67-1	<0.281	0.281	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFHpS	375-92-8	<0.614	0.614	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFNA	375-95-1	<0.367	0.367	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFOSA	754-91-6	<0.441	0.441	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFOS	1763-23-1	<0.745	0.745	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
9Cl-PF3ONS	756426-58-1	<0.696	0.696	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFDA	335-76-2	<0.636	0.636	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
8:2 FTS	39108-34-4	<0.525	0.525	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFNS	68259-12-1	<0.606	0.606	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
MeFOSAA	2355-31-9	<0.374	0.374	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
EtFOSAA	2991-50-6	<0.686	0.686	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFUnA	2058-94-8	<0.304	0.304	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFDS	335-77-3	<0.733	0.733	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
11Cl-PF3OUdS	763051-92-9	<1.10	1.10	1.46		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
10:2 FTS	120226-60-0	<0.509	0.509	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFDoA	307-55-1	<0.398	0.398	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
MeFOSA	31506-32-8	<3.08	3.08	9.75		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFTrDA	72629-94-8	<0.603	0.603	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFDoS	79780-39-5	<0.983	0.983	1.46		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFTeDA	376-06-7	<0.593	0.593	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
EtFOSE	4151-50-2	<4.87	4.87	9.75		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFHxDA	67905-19-5	<0.244	0.244	0.487		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
PFODA	16517-11-6	<0.946	0.946	0.975		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
MeFOSE	24448-09-7	<3.00	3.00	9.75		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
EtFOSE	1691-99-2	<3.43	3.43	9.75		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1		
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
13C3-PFBA	IS	95.9	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1			

**Sample ID: E510-3,S1,2'**
**PFAS Isotope Dilution Method**
**Client Data**

Name: C T Laboratories  
Project: TRUAX FIELD / 159556 VISTA  
Location: 530676

Matrix: Soil  
Date Collected: 01-Feb-21 12:30

**Laboratory Data**

Lab Sample: 2102109-06  
Date Received: 05-Feb-21 09:40  
% Solids: 84.8

Column: BEH C18

**Labeled Standards**
**Type**
**% Recovery**
**Limits**
**Qualifiers**
**Batch**
**Extracted**
**Samp Size**
**Analyzed**
**Dilution**

13C3-PFPcA	IS	90.4	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C3-PFBS	IS	104	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C3-HFPO-DA	IS	79.9	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-4:2 FTS	IS	104	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFHxA	IS	86.3	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C4-PFHxA	IS	88.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C3-PFHxS	IS	93.2	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-6:2 FTS	IS	101	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C5-PFNA	IS	78.6	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C8-PFOSA	IS	56.2	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFOA	IS	83.7	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C8-PFOS	IS	82.3	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFDA	IS	75.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-8:2 FTS	IS	86.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d3-MeFOSAA	IS	84.4	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFUnA	IS	71.2	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d5-EtFOSAA	IS	76.8	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-10:2 FTS	IS	87.7	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFDmA	IS	74.9	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d3-MeFOSA	IS	30.1	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFTeDA	IS	63.7	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d5-EtFOSA	IS	31.4	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
13C2-PFHxDA	IS	31.7	25 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d7-MeFOSE	IS	57.3	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1
d9-EtFOSE	IS	64.8	10 - 150		B1B0105	18-Feb-21	1.21 g	22-Feb-21 21:53	1

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.

The sample size is reported in wet weight.

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-3,S2,9 1/2'								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:		2102109-07		Column:		BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 12:40	Date Received:		05-Feb-21 09:40		% Solids:		93.9	
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.267	0.267	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFPeA	2706-90-3	<0.253	0.253	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFBS	375-73-5	<0.440	0.440	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
4:2 FTS	757124-72-4	<0.418	0.418	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFHxA	307-24-4	<0.641	0.641	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFPeS	2706-91-4	<0.325	0.325	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
HFPO-DA	13252-13-6	<0.550	0.550	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFHpA	375-85-9	<0.333	0.333	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
ADONA	919005-14-4	<0.351	0.351	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFHxS	355-46-4	<0.410	0.410	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
6:2 FTS	27619-97-2	<0.651	0.651	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFOA	335-67-1	<0.289	0.289	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFHpS	375-92-8	<0.633	0.633	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFNA	375-95-1	<0.378	0.378	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFOSA	754-91-6	<0.454	0.454	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFOS	1763-23-1	<0.767	0.767	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
9Cl-PF3ONS	756426-58-1	<0.717	0.717	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFDA	335-76-2	<0.655	0.655	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
8:2 FTS	39108-34-4	<0.540	0.540	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFNS	68259-12-1	<0.625	0.625	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
MeFOSAA	2355-31-9	<0.386	0.386	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
EtFOSAA	2991-50-6	<0.707	0.707	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFUnA	2058-94-8	<0.313	0.313	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFDS	335-77-3	<0.755	0.755	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
11Cl-PF3OUdS	763051-92-9	<1.13	1.13	1.51		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
10:2 FTS	120226-60-0	<0.524	0.524	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFDoA	307-55-1	<0.410	0.410	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
MeFOSA	31506-32-8	<3.17	3.17	10.0		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFTrDA	72629-94-8	<0.621	0.621	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFDoS	79780-39-5	<1.01	1.01	1.51		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFTeDA	376-06-7	<0.611	0.611	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
EtFOSE	4151-50-2	<5.02	5.02	10.0		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFHxDA	67905-19-5	<0.251	0.251	0.502		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
PFODA	16517-11-6	<0.974	0.974	1.00		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
MeFOSE	24448-09-7	<3.09	3.09	10.0		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
EtFOSE	1691-99-2	<3.53	3.53	10.0		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	86.5	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1		

**Sample ID: E510-3,S2,9 1/2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-07	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 12:40 <th>% Solids:</th> <td>93.9</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	93.9					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	78.2	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C3-PFBS	IS	94.1	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C3-HFPO-DA	IS	69.7	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-4:2 FTS	IS	83.3	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFHxA	IS	78.1	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C4-PFHpA	IS	88.3	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C3-PFHxS	IS	84.3	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-6:2 FTS	IS	84.4	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C5-PFNA	IS	74.4	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C8-PFOSA	IS	35.2	10 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFOA	IS	79.0	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C8-PFOS	IS	68.5	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFDA	IS	64.3	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-8:2 FTS	IS	72.7	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d3-MeFOSAA	IS	54.8	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFUnA	IS	50.1	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d5-EtFOSAA	IS	54.0	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-10:2 FTS	IS	64.8	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFDaA	IS	46.9	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d3-MeFOSA	IS	8.50	10 - 150	H	B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFTeDA	IS	60.8	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d5-EtFOSA	IS	7.40	10 - 150	H	B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
13C2-PFHxDA	IS	56.7	25 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d7-MeFOSE	IS	26.1	10 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	
d9-EtFOSE	IS	29.6	10 - 150		B1B0105	18-Feb-21	1.06 g	22-Feb-21 22:04	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

**Sample ID: E510-4,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data								
Name:	C T Laboratories <th>Matrix:</th> <td>Soil<th>Lab Sample:</th><td>2102109-12<th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>02-Feb-21 13:40<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td></td>	Matrix:	Soil <th>Lab Sample:</th> <td>2102109-12<th>Column:</th><td>BEH C18</td><th>Date Collected:</th><td>02-Feb-21 13:40<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td></td>	Lab Sample:	2102109-12 <th>Column:</th> <td>BEH C18</td> <th>Date Collected:</th> <td>02-Feb-21 13:40<th>Date Received:</th><td>05-Feb-21 09:40<th>% Solids:</th></td></td>	Column:	BEH C18	Date Collected:	02-Feb-21 13:40 <th>Date Received:</th> <td>05-Feb-21 09:40<th>% Solids:</th></td>	Date Received:	05-Feb-21 09:40 <th>% Solids:</th>	% Solids:
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
PFBA	375-22-4	0.357	0.263	0.494	J	B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFPeA	2706-90-3	<0.249	0.249	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFBS	375-73-5	<0.432	0.432	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
4:2 FTS	757124-72-4	<0.411	0.411	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFHxA	307-24-4	<0.630	0.630	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFPeS	2706-91-4	<0.320	0.320	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
HFPO-DA	13252-13-6	<0.541	0.541	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFHpA	375-85-9	<0.328	0.328	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
ADONA	919005-14-4	<0.346	0.346	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFHxS	355-46-4	0.646	0.403	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
6:2 FTS	27619-97-2	<0.640	0.640	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFOA	335-67-1	<0.284	0.284	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFHpS	375-92-8	<0.622	0.622	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFNA	375-95-1	<0.371	0.371	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFOSA	754-91-6	<0.446	0.446	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFOS	1763-23-1	1.18	0.754	0.987	Q	B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
9Cl-PF3ONS	756426-58-1	<0.705	0.705	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFDA	335-76-2	<0.644	0.644	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
8:2 FTS	39108-34-4	<0.531	0.531	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFNS	68259-12-1	<0.614	0.614	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
MeFOSAA	2355-31-9	<0.379	0.379	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
EtFOSAA	2991-50-6	<0.695	0.695	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFUnA	2058-94-8	<0.308	0.308	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFDS	335-77-3	<0.743	0.743	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
11Cl-PF3OUdS	763051-92-9	<1.11	1.11	1.48		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
10:2 FTS	120226-60-0	<0.515	0.515	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFDoA	307-55-1	<0.403	0.403	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
MeFOSA	31506-32-8	<3.12	3.12	9.87		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFTrDA	72629-94-8	<0.610	0.610	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFDoS	79780-39-5	<0.995	0.995	1.48		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFTeDA	376-06-7	<0.600	0.600	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
EtFOSE	4151-50-2	<4.94	4.94	9.87		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFHxDA	67905-19-5	<0.247	0.247	0.494		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
PFODA	16517-11-6	<0.958	0.958	0.987		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
MeFOSE	24448-09-7	<3.04	3.04	9.87		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
EtFOSE	1691-99-2	<3.48	3.48	9.87		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1		
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
13C3-PFBA	IS	80.9	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1			

**Sample ID: E510-4,S1,2'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-12	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	02-Feb-21 13:40 <th>% Solids:</th> <td>83.0</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	83.0					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	74.0	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C3-PFBS	IS	79.1	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C3-HFPO-DA	IS	68.7	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-4:2 FTS	IS	80.8	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFHxA	IS	73.0	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C4-PFHpA	IS	73.9	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C3-PFHxS	IS	82.2	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-6:2 FTS	IS	87.6	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C5-PFNA	IS	72.0	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C8-PFOSA	IS	41.6	10 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFOA	IS	67.1	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C8-PFOS	IS	70.5	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFDA	IS	67.7	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-8:2 FTS	IS	73.6	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d3-MeFOSAA	IS	62.1	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFUnA	IS	53.0	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d5-EtFOSAA	IS	65.4	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-10:2 FTS	IS	78.9	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFDaA	IS	62.3	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d3-MeFOSA	IS	20.2	10 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFTeDA	IS	55.7	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d5-EtFOSA	IS	18.2	10 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
13C2-PFHxDA	IS	38.6	25 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d7-MeFOSE	IS	43.0	10 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	
d9-EtFOSE	IS	51.2	10 - 150		B1B0105	18-Feb-21	1.22 g	22-Feb-21 22:14	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

**Sample ID: E510-4,S3,10'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-13	Date Received:	05-Feb-21 09:40	Column:	BEH C18		
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	02-Feb-21 13:50	% Solids:	97.6						
Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.265	0.265	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFPeA	2706-90-3	<0.251	0.251	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFBS	375-73-5	<0.436	0.436	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
4:2 FTS	757124-72-4	<0.414	0.414	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFHxA	307-24-4	<0.635	0.635	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFPeS	2706-91-4	<0.322	0.322	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
HFPO-DA	13252-13-6	<0.545	0.545	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFHpA	375-85-9	<0.330	0.330	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
ADONA	919005-14-4	<0.348	0.348	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFHxS	355-46-4	<0.406	0.406	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
6:2 FTS	27619-97-2	<0.644	0.644	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFOA	335-67-1	<0.286	0.286	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFHpS	375-92-8	<0.627	0.627	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFNA	375-95-1	<0.374	0.374	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFOSA	754-91-6	<0.450	0.450	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFOS	1763-23-1	<0.760	0.760	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
9Cl-PF3ONS	756426-58-1	<0.710	0.710	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFDA	335-76-2	<0.648	0.648	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
8:2 FTS	39108-34-4	<0.535	0.535	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFNS	68259-12-1	<0.619	0.619	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
MeFOSAA	2355-31-9	<0.382	0.382	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
EtFOSAA	2991-50-6	<0.700	0.700	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFUnA	2058-94-8	<0.310	0.310	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFDS	335-77-3	<0.748	0.748	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
11Cl-PF3OUdS	763051-92-9	<1.12	1.12	1.49		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
10:2 FTS	120226-60-0	<0.519	0.519	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFDoA	307-55-1	<0.406	0.406	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
MeFOSA	31506-32-8	<3.14	3.14	9.95		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFTrDA	72629-94-8	<0.615	0.615	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFDoS	79780-39-5	<1.00	1.00	1.49		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFTeDA	376-06-7	<0.605	0.605	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
EtFOSE	4151-50-2	<4.97	4.97	9.95		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFHxDA	67905-19-5	<0.249	0.249	0.497		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
PFODA	16517-11-6	<0.965	0.965	0.995		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
MeFOSE	24448-09-7	<3.06	3.06	9.95		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
EtFOSE	1691-99-2	<3.50	3.50	9.95		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	91.6	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1		

**Sample ID: E510-4,S3,10'**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Soil	Lab Sample:	2102109-13	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	02-Feb-21 13:50 <th>% Solids:</th> <td>97.6</td> <td></td> <td></td> <td></td> <td></td> <td></td>	% Solids:	97.6					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	85.5	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C3-PFBS	IS	96.2	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C3-HFPO-DA	IS	74.4	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-4:2 FTS	IS	87.4	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFHxA	IS	82.8	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C4-PFHpA	IS	89.4	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C3-PFHxS	IS	87.3	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-6:2 FTS	IS	97.6	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C5-PFNA	IS	78.1	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C8-PFOSA	IS	36.3	10 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFOA	IS	77.7	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C8-PFOS	IS	72.7	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFDA	IS	64.9	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-8:2 FTS	IS	69.1	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d3-MeFOSAA	IS	62.2	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFUnA	IS	56.4	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d5-EtFOSAA	IS	60.1	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-10:2 FTS	IS	75.3	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFDaA	IS	57.4	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d3-MeFOSA	IS	8.30	10 - 150	H	B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFTeDA	IS	75.3	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d5-EtFOSA	IS	8.30	10 - 150	H	B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
13C2-PFHxDA	IS	68.9	25 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d7-MeFOSE	IS	26.2	10 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	
d9-EtFOSE	IS	31.9	10 - 150		B1B0105	18-Feb-21	1.03 g	22-Feb-21 22:25	1	

MDL - Method Detection Limit

RL - Reporting limit

The results are reported in dry weight.  
The sample size is reported in wet weight.  
Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: Method Blank								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Aqueous	Lab Sample:		B1C0009-BLK1	Column:	BEH C18			
Project:	TRUAX FIELD / 159556 VISTA										
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.365	0.365	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFPeA	2706-90-3	<0.640	0.640	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFBS	375-73-5	<0.895	0.895	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
4:2 FTS	757124-72-4	<0.695	0.695	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFHxA	307-24-4	<1.09	1.09	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFPeS	2706-91-4	<1.21	1.21	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
HFPO-DA	13252-13-6	<2.41	2.41	2.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFHpA	375-85-9	<0.296	0.296	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
ADONA	919005-14-4	<0.361	0.361	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFHxS	355-46-4	<0.474	0.474	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
6:2 FTS	27619-97-2	<1.00	1.00	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFOA	335-67-1	<0.326	0.326	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFHpS	375-92-8	<0.469	0.469	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFNA	375-95-1	<0.405	0.405	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFOSA	754-91-6	<0.885	0.885	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFOS	1763-23-1	<0.404	0.404	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
9Cl-PF3ONS	756426-58-1	<0.725	0.725	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFDA	335-76-2	<0.745	0.745	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
8:2 FTS	39108-34-4	<1.03	1.03	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFNS	68259-12-1	<1.94	1.94	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
MeFOSAA	2355-31-9	<0.825	0.825	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
EtFOSAA	2991-50-6	<0.685	0.685	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFUnA	2058-94-8	<0.525	0.525	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFDS	335-77-3	<0.615	0.615	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
11Cl-PF3OUdS	763051-92-9	<1.21	1.21	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
10:2 FTS	120226-60-0	<1.57	1.57	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFDoA	307-55-1	<0.396	0.396	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
MeFOSA	31506-32-8	<6.85	6.85	8.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFTrDA	72629-94-8	<0.247	0.247	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFDoS	79780-39-5	<2.09	2.09	2.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFTeDA	376-06-7	<0.378	0.378	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
EtFOSE	4151-50-2	<7.30	7.30	8.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFHxDA	67905-19-5	<0.147	0.147	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
PFODA	16517-11-6	<3.07	3.07	3.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
MeFOSE	24448-09-7	<8.00	8.00	8.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
EtFOSE	1691-99-2	<5.55	5.55	8.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	
Labeled Standards		Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFBA	159556 - Page 81 of 121	IS	124	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1	

Sample ID: Method Blank								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Aqueous	Lab Sample:	B1C0009-BLK1	Column:	BEH C18				
Project:	TRUAX FIELD / 159556 VISTA										
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFPcA	IS	103	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C3-PFBS	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C3-HFPO-DA	IS	99.6	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-4:2 FTS	IS	104	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFHxA	IS	93.9	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C4-PFHxA	IS	105	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C3-PFHxS	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-6:2 FTS	IS	115	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C5-PFNA	IS	107	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C8-PFOSA	IS	59.3	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFOA	IS	103	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C8-PFOS	IS	113	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFDA	IS	99.9	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-8:2 FTS	IS	105	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d3-MeFOSAA	IS	88.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFUnA	IS	94.7	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d5-EtFOSAA	IS	84.3	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-10:2 FTS	IS	110	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFDaA	IS	87.4	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d3-MeFOSA	IS	30.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFTeDA	IS	81.7	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d5-EtFOSA	IS	30.9	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
13C2-PFHxDA	IS	87.0	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d7-MeFOSE	IS	37.2	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		
d9-EtFOSE	IS	44.5	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:45	1		

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: OPR											PFAS Isotope Dilution Method			
Client Data				Laboratory Data										
Name:	C T Laboratories	Matrix:	Aqueous	Lab Sample:	B1C0009-BS1			Column:	BEH C18					
Project:	TRUAX FIELD / 159556 VISTA													
Analyte	CAS Number	Amt Found (ng/L)	Spike Amt	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
PFBA	375-22-4	6.77	8.00	84.6	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFPeA	2706-90-3	7.04	8.00	87.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFBS	375-73-5	7.33	8.00	91.6	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
4:2 FTS	757124-72-4	7.09	8.00	88.6	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFHxA	307-24-4	8.09	8.00	101	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFPeS	2706-91-4	6.88	8.00	86.0	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
HFPO-DA	13252-13-6	7.42	8.00	92.7	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFHpA	375-85-9	7.82	8.00	97.7	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
ADONA	919005-14-4	7.10	8.00	88.7	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFHxS	355-46-4	7.28	8.00	90.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
6:2 FTS	27619-97-2	6.70	8.00	83.7	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFOA	335-67-1	7.39	8.00	92.3	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFHpS	375-92-8	6.95	8.00	86.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFNA	375-95-1	7.28	8.00	91.0	50 - 150	Q	B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFOSA	754-91-6	6.25	8.00	78.2	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFOS	1763-23-1	6.96	8.00	86.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
9Cl-PF3ONS	756426-58-1	6.91	8.00	86.4	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFDA	335-76-2	7.21	8.00	90.1	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
8:2 FTS	39108-34-4	6.28	8.00	78.5	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFNS	68259-12-1	7.41	8.00	92.7	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
MeFOSAA	2355-31-9	6.51	8.00	81.3	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
EtFOSAA	2991-50-6	7.43	8.00	92.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFUnA	2058-94-8	7.85	8.00	98.1	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFDS	335-77-3	6.28	8.00	78.6	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
11Cl-PF3OUdS	763051-92-9	7.86	8.00	98.3	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
10:2 FTS	120226-60-0	5.81	8.00	72.6	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFDoA	307-55-1	6.83	8.00	85.4	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
MeFOSA	31506-32-8	8.77	8.00	110	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFTrDA	72629-94-8	6.63	8.00	82.8	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFDoS	79780-39-5	7.69	8.08	95.2	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFTeDA	376-06-7	7.03	8.00	87.9	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
EtFOSA	4151-50-2	6.86	8.00	85.7	50 - 150	J	B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFHxDA	67905-19-5	7.03	8.00	87.8	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1			
PFODA	159556 - Page 83 of 121	16517-11-6	7.05	8.00	88.1	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1		

Sample ID: OPR										PFAS Isotope Dilution Method			
Client Data					Laboratory Data								
Name:	C T Laboratories	Matrix:	Aqueous	Lab Sample:	B1C0009-BS1			Column:	BEH C18				
Project:	TRUAX FIELD / 159556 VISTA												
Analyte	CAS Number	Amt Found (ng/L)	Spike Amt	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
MeFOSE	24448-09-7	9.15	8.00	114	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1		
EtFOSE	1691-99-2	8.96	8.00	112	50 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1		
Labeled Standards	Type	% Rec	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution				
13C3-PFBA	IS	121	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C3-PFPeA	IS	91.1	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C3-PFBS	IS	107	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C3-HFPO-DA	IS	90.7	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-4:2 FTS	IS	103	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFHxA	IS	91.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C4-PFHpA	IS	98.8	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C3-PFHxS	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-6:2 FTS	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C5-PFNA	IS	87.3	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C8-PFOSA	IS	55.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFOA	IS	98.5	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C8-PFOS	IS	115	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFDA	IS	93.3	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-8:2 FTS	IS	97.7	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d3-MeFOSAA	IS	96.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFUnA	IS	100	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d5-EtFOSAA	IS	89.1	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-10:2 FTS	IS	92.4	40 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFDaO	IS	85.3	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d3-MeFOSA	IS	26.6	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFTeDA	IS	85.9	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d5-EtFOSA	IS	25.9	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
13C2-PFHxDA	IS	87.5	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d7-MeFOSE	IS	36.6	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				
d9-EtFOSE	IS	39.1	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 19:55	1				

PFAS Isotope Dilution Method										
Client Data				Laboratory Data						
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample: 2102109-08					Column:	BEH C18
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 14:05	Date Received: 05-Feb-21 09:40						
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution
PFBA	375-22-4	11.9	0.827	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFPeA	2706-90-3	16.5	1.45	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFBS	375-73-5	7.61	2.03	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
4:2 FTS	757124-72-4	<1.58	1.58	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFHxA	307-24-4	13.9	2.47	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFPeS	2706-91-4	9.47	2.75	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
HFPO-DA	13252-13-6	<5.47	5.47	5.67		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFHpA	375-85-9	7.62	0.670	4.54	Q	B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
ADONA	919005-14-4	<0.819	0.819	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFHxS	355-46-4	82.9	1.07	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
6:2 FTS	27619-97-2	<2.27	2.27	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFOA	335-67-1	7.93	0.738	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFHpS	375-92-8	<1.06	1.06	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFNA	375-95-1	1.61	0.919	4.54	J	B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFOSA	754-91-6	<2.01	2.01	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFOS	1763-23-1	49.5	0.915	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
9Cl-PF3ONS	756426-58-1	<1.64	1.64	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFDA	335-76-2	<1.69	1.69	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
8:2 FTS	39108-34-4	<2.34	2.34	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFNS	68259-12-1	<4.39	4.39	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
MeFOSAA	2355-31-9	<1.87	1.87	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
EtFOSAA	2991-50-6	<1.55	1.55	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFUnA	2058-94-8	<1.19	1.19	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFDS	335-77-3	<1.40	1.40	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
11Cl-PF3OUdS	763051-92-9	<2.73	2.73	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
10:2 FTS	120226-60-0	<3.55	3.55	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFDoA	307-55-1	<0.898	0.898	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
MeFOSA	31506-32-8	<15.5	15.5	18.1		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFTrDA	72629-94-8	<0.560	0.560	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFDoS	79780-39-5	<4.73	4.73	5.67		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFTeDA	376-06-7	<0.856	0.856	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
EtFOSA	4151-50-2	<16.6	16.6	18.1		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFHxDA	67905-19-5	<0.333	0.333	4.54		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
PFODA	16517-11-6	<6.96	6.96	7.94		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
MeFOSE	24448-09-7	<18.1	18.1	18.1		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
EtFOSE	1691-99-2	<12.6	12.6	18.1		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFBA	IS	131	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	

**Sample ID: E510-3**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories <th>Matrix:</th> <td>Groundwater</td> <th>Lab Sample:</th> <td>2102109-08</td> <th>Date Received:</th> <td>05-Feb-21 09:40</td> <th>Column:</th> <td>BEH C18</td> <td></td>	Matrix:	Groundwater	Lab Sample:	2102109-08	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 14:05							
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	101	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C3-PFBS	IS	99.1	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C3-HFPO-DA	IS	98.8	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-4:2 FTS	IS	109	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFHxA	IS	98.9	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C4-PFHpA	IS	109	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C3-PFHxS	IS	105	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-6:2 FTS	IS	99.0	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C5-PFNA	IS	85.0	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C8-PFOSA	IS	76.5	10 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFOA	IS	97.7	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C8-PFOS	IS	112	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFDA	IS	101	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-8:2 FTS	IS	108	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d3-MeFOSAA	IS	95.6	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFUnA	IS	92.6	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d5-EtFOSAA	IS	87.8	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-10:2 FTS	IS	101	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFDaA	IS	87.3	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d3-MeFOSA	IS	37.2	10 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFTeDA	IS	86.5	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d5-EtFOSA	IS	36.7	10 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
13C2-PFHxDA	IS	89.0	25 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d7-MeFOSE	IS	56.7	10 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	
d9-EtFOSE	IS	65.1	10 - 150		B1C0009	02-Mar-21	0.110 L	03-Mar-21 20:06	1	

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-1										PFAS Isotope Dilution Method			
Client Data				Laboratory Data									
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:	2102109-09	Column:	BEH C18						
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 14:50	Date Received:	05-Feb-21 09:40								
Location:	530679												
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
PFBA	375-22-4	6.74	0.359	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFPeA	2706-90-3	6.56	0.630	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFBS	375-73-5	3.46	0.882	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
4:2 FTS	757124-72-4	<0.685	0.685	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFHxA	307-24-4	6.88	1.07	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFPeS	2706-91-4	1.81	1.19	1.97	J	B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
HFPO-DA	13252-13-6	<2.37	2.37	2.46		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFHpA	375-85-9	4.96	0.291	1.97	Q	B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
ADONA	919005-14-4	<0.356	0.356	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFHxS	355-46-4	40.8	0.466	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
6:2 FTS	27619-97-2	<0.985	0.985	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFOA	335-67-1	7.39	0.321	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFHpS	375-92-8	1.26	0.462	1.97	J	B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFNA	375-95-1	4.85	0.399	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFOSA	754-91-6	<0.872	0.872	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFOS	1763-23-1	87.8	0.398	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
9Cl-PF3ONS	756426-58-1	<0.714	0.714	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFDA	335-76-2	<0.734	0.734	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
8:2 FTS	39108-34-4	<1.01	1.01	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFNS	68259-12-1	<1.91	1.91	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
MeFOSAA	2355-31-9	<0.813	0.813	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
EtFOSAA	2991-50-6	<0.675	0.675	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFUnA	2058-94-8	<0.517	0.517	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFDS	335-77-3	<0.606	0.606	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
11Cl-PF3OUdS	763051-92-9	<1.19	1.19	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
10:2 FTS	120226-60-0	<1.54	1.54	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFDoA	307-55-1	<0.390	0.390	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
MeFOSA	31506-32-8	<6.75	6.75	7.88		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFTrDA	72629-94-8	<0.243	0.243	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFDoS	79780-39-5	<2.05	2.05	2.46		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFTeDA	376-06-7	<0.372	0.372	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
EtFOSE	4151-50-2	<7.19	7.19	7.88		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFHxD	67905-19-5	<0.145	0.145	1.97		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
PFODA	16517-11-6	<3.02	3.02	3.45		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
MeFOSE	24448-09-7	<7.88	7.88	7.88		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
EtFOSE	1691-99-2	<5.47	5.47	7.88		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1			
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution				
13C3-PFBA	IS	114	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1				

Sample ID: E510-1								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:		2102109-09		Column:		BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 14:50	Date Received:		05-Feb-21 09:40					
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFPcA	IS	97.4	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C3-PFBS	IS	107	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C3-HFPO-DA	IS	92.8	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-4:2 FTS	IS	109	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFHxA	IS	97.1	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C4-PFHxA	IS	104	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C3-PFHxS	IS	117	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-6:2 FTS	IS	101	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C5-PFNA	IS	103	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C8-PFOSA	IS	72.5	10 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFOA	IS	94.5	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C8-PFOS	IS	105	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFDA	IS	92.0	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-8:2 FTS	IS	121	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d3-MeFOSAA	IS	90.9	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFUnA	IS	92.9	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d5-EtFOSAA	IS	90.1	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-10:2 FTS	IS	82.9	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFDaA	IS	79.7	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d3-MeFOSA	IS	35.1	10 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFTeDA	IS	78.5	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d5-EtFOSA	IS	31.1	10 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
13C2-PFHxDA	IS	83.7	25 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d7-MeFOSE	IS	41.4	10 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		
d9-EtFOSE	IS	46.2	10 - 150		B1C0009	02-Mar-21	0.254 L	03-Mar-21 20:16	1		

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-1 DUP								PFAS Isotope Dilution Method				
Client Data				Laboratory Data								
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:	2102109-10	Column:	BEH C18	Date Collected:	01-Feb-21 14:50	Date Received:	05-Feb-21 09:40	
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
PFBA	375-22-4	6.64	0.365	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFPeA	2706-90-3	6.16	0.641	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFBS	375-73-5	3.66	0.896	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
4:2 FTS	757124-72-4	<0.696	0.696	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFHxA	307-24-4	6.67	1.09	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFPeS	2706-91-4	2.30	1.21	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
HFPO-DA	13252-13-6	<2.41	2.41	2.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFHpA	375-85-9	5.26	0.296	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
ADONA	919005-14-4	<0.361	0.361	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFHxS	355-46-4	45.8	0.474	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
6:2 FTS	27619-97-2	<1.00	1.00	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFOA	335-67-1	7.41	0.326	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFHpS	375-92-8	<0.469	0.469	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFNA	375-95-1	3.99	0.405	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFOSA	754-91-6	<0.886	0.886	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFOS	1763-23-1	78.4	0.404	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
9Cl-PF3ONS	756426-58-1	<0.726	0.726	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFDA	335-76-2	<0.746	0.746	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
8:2 FTS	39108-34-4	<1.03	1.03	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFNS	68259-12-1	<1.94	1.94	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
MeFOSAA	2355-31-9	<0.826	0.826	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
EtFOSAA	2991-50-6	<0.686	0.686	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFUnA	2058-94-8	<0.526	0.526	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFDS	335-77-3	<0.616	0.616	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
11Cl-PF3OUdS	763051-92-9	<1.21	1.21	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
10:2 FTS	120226-60-0	<1.57	1.57	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFDoA	307-55-1	<0.396	0.396	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
MeFOSA	31506-32-8	<6.86	6.86	8.01		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFTrDA	72629-94-8	<0.247	0.247	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFDoS	79780-39-5	<2.09	2.09	2.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFTeDA	376-06-7	<0.378	0.378	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
EtFOSE	4151-50-2	<7.31	7.31	8.01		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFHxDa	67905-19-5	<0.147	0.147	2.00		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
PFODA	16517-11-6	<3.07	3.07	3.50		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
MeFOSE	24448-09-7	<8.01	8.01	8.01		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
EtFOSE	1691-99-2	<5.56	5.56	8.01		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		
Labeled Standards		Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	159556 - Page 89 of 121	IS	122	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1		

**Sample ID: E510-1 DUP**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories <th>Matrix:</th> <td>Groundwater</td> <th>Lab Sample:</th> <td>2102109-10</td> <th>Date Received:</th> <td>05-Feb-21 09:40</td> <th>Column:</th> <td>BEH C18</td> <td></td>	Matrix:	Groundwater	Lab Sample:	2102109-10	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 14:50							
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	98.6	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C3-PFBS	IS	106	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C3-HFPO-DA	IS	101	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-4:2 FTS	IS	108	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFHxA	IS	99.4	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C4-PFHpA	IS	108	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C3-PFHxS	IS	110	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-6:2 FTS	IS	102	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C5-PFNA	IS	98.8	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C8-PFOSA	IS	66.7	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFOA	IS	97.7	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C8-PFOS	IS	119	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFDA	IS	101	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-8:2 FTS	IS	113	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d3-MeFOSAA	IS	97.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFUnA	IS	91.0	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d5-EtFOSAA	IS	100	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-10:2 FTS	IS	105	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFDaA	IS	86.4	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d3-MeFOSA	IS	36.0	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFTeDA	IS	91.5	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d5-EtFOSA	IS	34.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
13C2-PFHxDA	IS	90.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d7-MeFOSE	IS	48.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	
d9-EtFOSE	IS	55.4	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:27	1	

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-2

## PFAS Isotope Dilution Method

Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:	2102109-11		Column:	BEH C18			
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 16:05	Date Received:	05-Feb-21 09:40						
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	4.12	0.364	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFPeA	2706-90-3	1.21	0.638	2.00	J	B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFBS	375-73-5	13.0	0.893	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
4:2 FTS	757124-72-4	<0.693	0.693	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFHxA	307-24-4	1.94	1.09	2.00	J	B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFPeS	2706-91-4	11.4	1.21	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
HFPO-DA	13252-13-6	<2.40	2.40	2.49		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFHpA	375-85-9	<0.295	0.295	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
ADONA	919005-14-4	<0.360	0.360	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFHxS	355-46-4	137	0.472	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
6:2 FTS	27619-97-2	<0.998	0.998	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFOA	335-67-1	1.05	0.325	2.00	J	B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFHpS	375-92-8	12.1	0.467	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFNA	375-95-1	<0.404	0.404	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFOSA	754-91-6	<0.883	0.883	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFOS	1763-23-1	26.1	0.403	2.00	Q	B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
9Cl-PF3ONS	756426-58-1	<0.723	0.723	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFDA	335-76-2	<0.743	0.743	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
8:2 FTS	39108-34-4	<1.03	1.03	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFNS	68259-12-1	<1.93	1.93	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
MeFOSAA	2355-31-9	<0.823	0.823	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
EtFOSAA	2991-50-6	<0.683	0.683	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFUnA	2058-94-8	<0.524	0.524	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFDS	335-77-3	<0.614	0.614	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
11Cl-PF3OUdS	763051-92-9	<1.20	1.20	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
10:2 FTS	120226-60-0	<1.56	1.56	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFDoA	307-55-1	<0.395	0.395	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
MeFOSA	31506-32-8	<6.83	6.83	7.98		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFTrDA	72629-94-8	<0.246	0.246	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFDoS	79780-39-5	<2.08	2.08	2.49		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFTeDA	376-06-7	<0.377	0.377	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
EtFOSA	4151-50-2	<7.28	7.28	7.98		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFHxDA	67905-19-5	<0.147	0.147	2.00		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
PFODA	16517-11-6	<3.06	3.06	3.49		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
MeFOSE	24448-09-7	<7.98	7.98	7.98		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
EtFOSE	1691-99-2	<5.54	5.54	7.98		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	122	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1		

**Sample ID: E510-2**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories <th>Matrix:</th> <td>Groundwater</td> <th>Lab Sample:</th> <td>2102109-11</td> <th>Date Received:</th> <td>05-Feb-21 09:40</td> <th>Column:</th> <td>BEH C18</td> <td></td>	Matrix:	Groundwater	Lab Sample:	2102109-11	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	01-Feb-21 16:05							
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	97.3	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C3-PFBS	IS	99.7	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C3-HFPO-DA	IS	107	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-4:2 FTS	IS	114	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFHxA	IS	99.9	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C4-PFHxA	IS	106	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C3-PFHxS	IS	111	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-6:2 FTS	IS	108	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C5-PFNA	IS	103	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C8-PFOSA	IS	76.5	10 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFOA	IS	105	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C8-PFOS	IS	112	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFDA	IS	100	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-8:2 FTS	IS	113	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d3-MeFOSAA	IS	97.1	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFUnA	IS	92.8	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d5-EtFOSAA	IS	93.8	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-10:2 FTS	IS	103	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFDmA	IS	81.2	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d3-MeFOSA	IS	34.6	10 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFTeDA	IS	88.3	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d5-EtFOSA	IS	33.4	10 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
13C2-PFHxDA	IS	87.2	25 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d7-MeFOSE	IS	55.2	10 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	
d9-EtFOSE	IS	59.4	10 - 150		B1C0009	02-Mar-21	0.251 L	03-Mar-21 20:37	1	

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: E510-4										PFAS Isotope Dilution Method			
Client Data				Laboratory Data									
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:	2102109-14	Column:	BEH C18	Date Collected:	02-Feb-21 14:35	Date Received:	05-Feb-21 09:40		
Location:	530685	Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	15.7	0.364	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFPeA	2706-90-3	19.8	0.640	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFBS	375-73-5	10.6	0.894	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
4:2 FTS	757124-72-4	<0.695	0.695	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFHxA	307-24-4	26.2	1.09	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFPeS	2706-91-4	10.6	1.21	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
HFPO-DA	13252-13-6	<2.41	2.41	2.50	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFHpA	375-85-9	24.7	0.295	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
ADONA	919005-14-4	<0.361	0.361	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFHxS	355-46-4	272	0.473	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
6:2 FTS	27619-97-2	<0.999	0.999	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFOA	335-67-1	53.9	0.325	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFHpS	375-92-8	5.80	0.468	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFNA	375-95-1	2.55	0.405	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFOSA	754-91-6	<0.884	0.884	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFOS	1763-23-1	48.0	0.403	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
9Cl-PF3ONS	756426-58-1	<0.725	0.725	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFDA	335-76-2	<0.744	0.744	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
8:2 FTS	39108-34-4	<1.03	1.03	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFNS	68259-12-1	<1.93	1.93	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
MeFOSAA	2355-31-9	<0.824	0.824	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
EtFOSAA	2991-50-6	<0.685	0.685	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFUnA	2058-94-8	<0.525	0.525	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFDS	335-77-3	<0.615	0.615	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
11Cl-PF3OUdS	763051-92-9	<1.20	1.20	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
10:2 FTS	120226-60-0	<1.56	1.56	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFDoA	307-55-1	<0.396	0.396	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
MeFOSA	31506-32-8	<6.85	6.85	7.99	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFTrDA	72629-94-8	<0.247	0.247	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFDoS	79780-39-5	<2.08	2.08	2.50	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFTeDA	376-06-7	<0.377	0.377	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
EtFOSE	4151-50-2	<7.30	7.30	7.99	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFHxDA	67905-19-5	<0.147	0.147	2.00	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
PFODA	16517-11-6	<3.07	3.07	3.50	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
MeFOSE	24448-09-7	<7.99	7.99	7.99	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
EtFOSE	1691-99-2	<5.55	5.55	7.99	B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1				
Labeled Standards		Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution			
13C3-PFBA	159556 - Page 93 of 121	IS	138	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1			

Sample ID: E510-4								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample:	2102109-14	Date Received:	05-Feb-21 09:40	Column:	BEH C18		
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	02-Feb-21 14:35								
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFPcA	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C3-PFBS	IS	113	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C3-HFPO-DA	IS	112	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-4:2 FTS	IS	116	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFHxA	IS	108	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C4-PFHxA	IS	115	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C3-PFHxS	IS	108	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-6:2 FTS	IS	113	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C5-PFNA	IS	111	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C8-PFOSA	IS	81.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFOA	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C8-PFOS	IS	130	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFDA	IS	109	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-8:2 FTS	IS	112	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d3-MeFOSAA	IS	108	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFUnA	IS	104	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d5-EtFOSAA	IS	101	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-10:2 FTS	IS	106	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFDaA	IS	92.8	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d3-MeFOSA	IS	42.2	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFTeDA	IS	92.4	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d5-EtFOSA	IS	39.8	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
13C2-PFHxDA	IS	92.2	25 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d7-MeFOSE	IS	57.3	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		
d9-EtFOSE	IS	62.9	10 - 150		B1C0009	02-Mar-21	0.250 L	03-Mar-21 20:48	1		

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

Sample ID: PUMP BLANK								PFAS Isotope Dilution Method			
Client Data				Laboratory Data							
Name:	C T Laboratories	Matrix:	Groundwater	Lab Sample: 2102109-15				Column: BEH C18			
Analyte	CAS Number	Conc. (ng/L)	MDL	RL	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
PFBA	375-22-4	<0.367	0.367	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFPeA	2706-90-3	<0.644	0.644	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFBS	375-73-5	<0.900	0.900	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
4:2 FTS	757124-72-4	<0.699	0.699	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFHxA	307-24-4	<1.10	1.10	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFPeS	2706-91-4	<1.22	1.22	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
HFPO-DA	13252-13-6	<2.42	2.42	2.51		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFHpA	375-85-9	<0.297	0.297	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
ADONA	919005-14-4	<0.363	0.363	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFHxS	355-46-4	<0.476	0.476	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
6:2 FTS	27619-97-2	<1.01	1.01	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFOA	335-67-1	<0.327	0.327	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFHpS	375-92-8	<0.471	0.471	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFNA	375-95-1	<0.407	0.407	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFOSA	754-91-6	<0.890	0.890	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFOS	1763-23-1	<0.406	0.406	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
9Cl-PF3ONS	756426-58-1	<0.729	0.729	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFDA	335-76-2	<0.749	0.749	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
8:2 FTS	39108-34-4	<1.04	1.04	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFNS	68259-12-1	<1.95	1.95	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
MeFOSAA	2355-31-9	<0.830	0.830	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
EtFOSAA	2991-50-6	<0.689	0.689	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFUnA	2058-94-8	<0.528	0.528	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFDS	335-77-3	<0.619	0.619	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
11Cl-PF3OUdS	763051-92-9	<1.21	1.21	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
10:2 FTS	120226-60-0	<1.57	1.57	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFDoA	307-55-1	<0.398	0.398	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
MeFOSA	31506-32-8	<6.89	6.89	8.05		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFTrDA	72629-94-8	<0.248	0.248	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFDoS	79780-39-5	<2.10	2.10	2.51		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFTeDA	376-06-7	<0.380	0.380	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
EtFOSE	4151-50-2	<7.34	7.34	8.05		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFHxDa	67905-19-5	<0.148	0.148	2.01		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
PFODA	16517-11-6	<3.09	3.09	3.52		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
MeFOSE	24448-09-7	<8.05	8.05	8.05		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
EtFOSE	1691-99-2	<5.58	5.58	8.05		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution		
13C3-PFBA	IS	133	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1		

**Sample ID: PUMP BLANK**
**PFAS Isotope Dilution Method**

Client Data				Laboratory Data						
Name:	C T Laboratories <th>Matrix:</th> <td>Groundwater</td> <th>Lab Sample:</th> <td>2102109-15</td> <th>Date Received:</th> <td>05-Feb-21 09:40</td> <th>Column:</th> <td>BEH C18</td> <td></td>	Matrix:	Groundwater	Lab Sample:	2102109-15	Date Received:	05-Feb-21 09:40	Column:	BEH C18	
Project:	TRUAX FIELD / 159556 VISTA	Date Collected:	02-Feb-21 15:00							
Labeled Standards	Type	% Recovery	Limits	Qualifiers	Batch	Extracted	Samp Size	Analyzed	Dilution	
13C3-PFPcA	IS	109	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C3-PFBS	IS	119	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C3-HFPO-DA	IS	105	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-4:2 FTS	IS	123	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFHxA	IS	103	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C4-PFHpA	IS	114	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C3-PFHxS	IS	129	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-6:2 FTS	IS	117	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C5-PFNA	IS	104	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C8-PFOSA	IS	63.9	10 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFOA	IS	105	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C8-PFOS	IS	122	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFDA	IS	112	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-8:2 FTS	IS	116	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d3-MeFOSAA	IS	103	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFUnA	IS	106	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d5-EtFOSAA	IS	98.3	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-10:2 FTS	IS	106	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFDaO	IS	98.6	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d3-MeFOSA	IS	31.1	10 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFTeDA	IS	92.4	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d5-EtFOSA	IS	29.2	10 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
13C2-PFHxDA	IS	96.4	25 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d7-MeFOSE	IS	41.5	10 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	
d9-EtFOSE	IS	47.0	10 - 150		B1C0009	02-Mar-21	0.249 L	03-Mar-21 20:58	1	

MDL - Method Detection Limit

RL - Reporting limit

Results reported to MDL.

When reported, PFHxS, PFOA, PFOS, MeFOSAA and EtFOSAA include both linear and branched isomers. Only the linear isomer is reported for all other analytes.

B	This compound was also detected in the method blank
Conc.	Concentration
CRS	Cleanup Recovery Standard
D	Dilution
DL	Detection Limit
E	The associated compound concentration exceeded the calibration range of the instrument
H	Recovery and/or RPD was outside laboratory acceptance limits
I	Chemical Interference
IS	Internal Standard
J	The amount detected is below the Reporting Limit/LOQ
LOD	Limit of Detection
LOQ	Limit of Quantitation
M	Estimated Maximum Possible Concentration (CA Region 2 projects only)
MDL	Method Detection Limit
NA	Not applicable
ND	Not Detected
OPR	Ongoing Precision and Recovery sample
P	The reported concentration may include contribution from chlorinated diphenyl ether(s).
Q	The ion transition ratio is outside of the acceptance criteria.
RL	Reporting Limit
RL	For 537.1, the reported RLs are the MRLs.
TEQ	Toxic Equivalency, sum of the toxic equivalency factors (TEF) multiplied by the sample concentrations.
TEQMax	TEQ calculation that uses the detection limit as the concentration for non-detects
TEQMin	TEQ calculation that uses zero as the concentration for non-detects
TEQRisk	TEQ calculation that uses $\frac{1}{2}$ the detection limit as the concentration for non-detects
U	Not Detected (specific projects only)
*	See Cover Letter

Unless otherwise noted, solid sample results are reported in dry weight. Tissue samples are reported in wet weight.

## Vista Analytical Laboratory Certifications

<b>Accrediting Authority</b>	<b>Certificate Number</b>
Alaska Department of Environmental Conservation	17-013
Arkansas Department of Environmental Quality	19-013-0
California Department of Health – ELAP	2892
DoD ELAP - A2LA Accredited - ISO/IEC 17025:2005	3091.01
Florida Department of Health	E87777-23
Hawaii Department of Health	N/A
Louisiana Department of Environmental Quality	01977
Maine Department of Health	2018017
Massachusetts Department of Environmental Protection	N/A
Michigan Department of Environmental Quality	9932
Minnesota Department of Health	1521520
New Hampshire Environmental Accreditation Program	207718-B
New Jersey Department of Environmental Protection	190001
New York Department of Health	11411
Oregon Laboratory Accreditation Program	4042-010
Pennsylvania Department of Environmental Protection	016
Texas Commission on Environmental Quality	T104704189-19-10
Vermont Department of Health	VT-4042
Virginia Department of General Services	10272
Washington Department of Ecology	C584-19
Wisconsin Department of Natural Resources	998036160

*Current certificates and lists of licensed parameters are located in the Quality Assurance office and are available upon request.*

## NELAP Accredited Test Methods

MATRIX: Air	
Description of Test	Method
Determination of Polychlorinated p-Dioxins & Polychlorinated Dibenzofurans	EPA 23
Determination of Polychlorinated p-Dioxins & Polychlorinated Dibenzofurans	EPA TO-9A

MATRIX: Biological Tissue	
Description of Test	Method
Tetra- through Octa-Chlorinated Dioxins and Furans by Isotope Dilution GC/HRMS	EPA 1613B
Brominated Diphenyl Ethers by HRGC/HRMS	EPA 1614A
Chlorinated Biphenyl Congeners in Water, Soil, Sediment, and Tissue by GC/HRMS	EPA 1668A/C
Pesticides in Water, Soil, Sediment, Biosolids, and Tissue by HRGC/HRMS	EPA 1699
Perfluorinated Alkyl Acids in Drinking Water by SPE and LC/MS/MS	EPA 537
Polychlorinated Dibenzo-p-Dioxins and Polychlorinated Dibenzofurans by GC/HRMS	EPA 8280A/B
Polychlorinated Dibenzodioxins (PCDDs) and Polychlorinated Dibenzofurans (PCDFs) by GC/HRMS	EPA 8290/8290A

MATRIX: Drinking Water	
Description of Test	Method
2,3,7,8-Tetrachlorodibenzo- p-dioxin (2,3,7,8-TCDD) GC/HRMS	EPA 1613/1613B
1,4-Dioxane (1,4-Diethyleneoxide) analysis by GC/HRMS	EPA 522
Perfluorinated Alkyl Acids in Drinking Water by SPE and LC/MS/MS	EPA 537
Perfluorinated Alkyl Acids in Drinking Water by SPE and LC/MS/MS	ISO 25101 2009

MATRIX: Non-Potable Water	
Description of Test	Method
Tetra- through Octa-Chlorinated Dioxins and Furans by Isotope Dilution GC/HRMS	EPA 1613B
Brominated Diphenyl Ethers by HRGC/HRMS	EPA 1614A
Chlorinated Biphenyl Congeners in Water, Soil, Sediment, and Tissue by GC/HRMS	EPA 1668A/C
Pesticides in Water, Soil, Sediment, Biosolids, and Tissue by HRGC/HRMS	EPA 1699
Perfluorinated Alkyl Acids in Drinking Water by SPE and LC/MS/MS	EPA 537
Dioxin by GC/HRMS	EPA 613
Polychlorinated Dibenzo-p-Dioxins and Polychlorinated Dibenzofurans by GC/HRMS	EPA 8280A/B
Polychlorinated Dibenzodioxins (PCDDs) and Polychlorinated Dibenzofurans (PCDFs) by GC/HRMS	EPA 8290/8290A

MATRIX: Solids	
Description of Test	Method
Tetra-Octa Chlorinated Dioxins and Furans by Isotope Dilution GC/HRMS	EPA 1613
Tetra- through Octa-Chlorinated Dioxins and Furans by Isotope Dilution GC/HRMS	EPA 1613B
Brominated Diphenyl Ethers by HRGC/HRMS	EPA 1614A
Chlorinated Biphenyl Congeners in Water, Soil, Sediment, and Tissue by GC/HRMS	EPA 1668A/C
Pesticides in Water, Soil, Sediment, Biosolids, and Tissue by HRGC/HRMS	EPA 1699
Perfluorinated Alkyl Acids in Drinking Water by SPE and LC/MS/MS	EPA 537
Polychlorinated Dibenzo-p-Dioxins and Polychlorinated Dibenzofurans by GC/HRMS	EPA 8280A/B
Polychlorinated Dibenzodioxins (PCDDs) and Polychlorinated Dibenzofurans (PCDFs) by GC/HRMS	EPA 8290/8290A

**Sub-Contract Laboratory Chain-of-Custody and Purchase Order**

PURCHASE ORDER # 159556 VISTA

*The PO# must appear on all invoice and reports!*

Upon Receipt of Samples, please verify that samples were received in acceptable condition then sign this form and fax to (608)356-2766 or email to the project manager. Sample temperature, upon receipt, must be recorded on this document unless thermal preservation is not a method requirement.

Ship to: **Vista Analytical**  
1104 Winfield Way  
El Dorado Hills, CA

Return Invoice and Results to: **ekorthals@ctlaboratories.com**

Government UPS Shipping Acct?  Y  N

Ship by: Speedee  UPS Grnd  UPS 2nd  UPS NDA

Date Due: STD RUSH TURNAROUND NEEDED?  Y or  N (Circle One)

Project Name: TRUAX FIELD Project State: WI

Analytical/QC Criteria: NONE INDICATED STATE DOD QSM NELAP (Circle one) OTHER \_\_\_\_\_

Report results as EDD? N  Y (Circle one and indicate type: EXCEL) Data Deliverable Package LEVEL: LEVEL 2

CTLabs ID#	Sample Date/Time	Matrix	Sample Description	Analyses / Method	Cost
530671 **	02/01/2021 1045	SOIL	E510-1,S1,2'	PFOS/PFOA	_____
530672	02/01/2021 1125	SOIL	E510-1,S3,10'	PFOS/PFOA	_____
530673	02/01/2021 1125	SOIL	E510-1, DUP	PFOS/PFOA	_____
530674	02/01/2021 1155	SOIL	E510-2,S1,2'	PFOS/PFOA	_____
530675	02/01/2021 1210	SOIL	E510-2,S3,10'	PFOS/PFOA	_____
530676	02/01/2021 1230	SOIL	E510-3,S1,2'	PFOS/PFOA	_____
530677	02/01/2021 1240	SOIL	E510-3,S2,9 1/2'	PFOS/PFOA	_____
530678	02/01/2021 1405	GROUND WATER	E510-3	PFOS/PFOA	_____
530679	02/01/2021 1450	GROUND WATER	E510-1	PFOS/PFOA	_____
530680	02/01/2021 1450	GROUND WATER	E510-1 DUP	PFOS/PFOA	_____
530681	02/01/2021 1605	GROUND WATER	E510-2	PFOS/PFOA	_____
530683	02/02/2021 1340	SOIL	E510-4,S1,2'	PFOS/PFOA	_____
530684	02/02/2021 1350	SOIL	E510-4,S3,10'	PFOS/PFOA	_____
530685	02/02/2021 1435	GROUND WATER	E510-4	PFOS/PFOA	_____
530686	02/02/2021 1500	GROUND WATER	PUMP BLANK	PFOS/PFOA	_____

Relinquished by:



Date/Time: 2-4-2021/0800h

Received by:



Date/Time: 02/05/21 0940 Receipt Temperature (C) \_\_\_\_\_

COMMENTS: USE SAMPLE DESCRIPTION, \*\*DESIGNATED FOR MS/MSD

REPORT ALL SOLIDS ON A DRY WEIGHT BASIS UNLESS OTHERWISE INDICATED

Form #: FPM1-01  
Effective Date: 02/15/14

## Sample Log-In Checklist

Page # 1 of 1

Vista Work Order #: 2102109

TAT Std

Samples Arrival:	Date/Time		Initials:		Location:		
	02/05/21	0940	<u>KS</u>		WR-2		
Delivered By:	FedEx	<u>UPS</u>	On Trac	GLS	DHL	Hand Delivered	Other
Preservation:	<u>Ice</u>		Blue Ice		Techni Ice	Dry Ice	None
Temp °C: <u>0.2</u> (uncorrected)	Probe used: Y / <u>N</u>			Thermometer ID: <u>LR-4</u>			
Temp °C: <u>0.2</u> (corrected)							

	YES	NO	NA
Shipping Container(s) Intact?	<input checked="" type="checkbox"/>		
Shipping Custody Seals Intact?		<input checked="" type="checkbox"/>	
Airbill <u>      </u> Trk # <u>1Z 1A4 A85 01 4239 8895</u>	<input checked="" type="checkbox"/>		
Shipping Documentation Present?	<input checked="" type="checkbox"/>		
Shipping Container	Vista	<u>Client</u>	Retain
Chain of Custody / Sample Documentation Present?	<input checked="" type="checkbox"/>		
Chain of Custody / Sample Documentation Complete?	<input checked="" type="checkbox"/>		
Holding Time Acceptable?	<input checked="" type="checkbox"/>		
Logged In:	Date/Time	Initials:	Location:
	02/08/21 0641	<u>KS</u>	R-13   WR-2
			Shelf/Rack: <u>A-2 A-4/B-4</u>
COC Anomaly/Sample Acceptance Form completed?		<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

Comments:

# CoC/Label Reconciliation Report WO# 2102109

LabNumber	CoC Sample ID		SampleAlias	Sample Date/Time	Container	BaseMatrix	Sample Comments
2102109-01	A E510-1,S1,2'	<input checked="" type="checkbox"/> A	530671	01-Feb-21 10:45	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid MS/MSD
2102109-02	A E510-1,S3,10'	<input checked="" type="checkbox"/>	530672	01-Feb-21 11:25	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-03	A E510-1, DUP	<input checked="" type="checkbox"/>	530673	01-Feb-21 11:25	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-04	A E510-2,S1,2'	<input checked="" type="checkbox"/>	530674	01-Feb-21 11:55	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-05	A E510-2,S3,10'	<input checked="" type="checkbox"/>	530675	01-Feb-21 12:10	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-06	A E510-3,S1,2'	<input checked="" type="checkbox"/>	530676	01-Feb-21 12:30	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-07	A E510-3,S2,9 1/2'	<input checked="" type="checkbox"/>	530677	01-Feb-21 12:40	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-08	A E510-3	<input checked="" type="checkbox"/>	530678	01-Feb-21 14:05	<input checked="" type="checkbox"/>	HDPE Bottle, 125 mL	Aqueous
2102109-08	B E510-3	<input checked="" type="checkbox"/>	530678	01-Feb-21 14:05	<input checked="" type="checkbox"/>	HDPE Bottle, 125 mL	Aqueous
2102109-09	A E510-1	<input checked="" type="checkbox"/>	530679	01-Feb-21 14:50	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-09	B E510-1	<input checked="" type="checkbox"/>	530679	01-Feb-21 14:50	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-10	A E510-1 DUP	<input checked="" type="checkbox"/>	530680	01-Feb-21 14:50	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-10	B E510-1 DUP	<input checked="" type="checkbox"/> B	530680	01-Feb-21 14:50	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-11	A E510-2	<input checked="" type="checkbox"/> A	530681	01-Feb-21 16:05	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-11	B E510-2	<input checked="" type="checkbox"/>	530681	01-Feb-21 16:05	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-12	A E510-4,S1,2'	<input checked="" type="checkbox"/>	530683	02-Feb-21 13:40	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-13	A E510-4,S3,10'	<input checked="" type="checkbox"/>	530684	02-Feb-21 13:50	<input checked="" type="checkbox"/>	HDPE Jar, 6 oz	Solid
2102109-14	A E510-4	<input checked="" type="checkbox"/>	530685	02-Feb-21 14:35	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-14	B E510-4	<input checked="" type="checkbox"/>	530685	02-Feb-21 14:35	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-15	A PUMP BLANK	<input checked="" type="checkbox"/>	530686	02-Feb-21 15:00	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous
2102109-15	B PUMP BLANK	<input checked="" type="checkbox"/>	530686	02-Feb-21 15:00	<input checked="" type="checkbox"/>	HDPE Bottle, 250 mL	Aqueous

Checkmarks indicate that information on the COC reconciled with the sample label.

Any discrepancies are noted in the following columns.

	Yes	No	NA
Sample Container Intact?	✓		
Sample Custody Seals Intact?			✓
Adequate Sample Volume?	✓		
Container Type Appropriate for Analysis(es)	✓		
Preservation Documented: Na2S2O3 Trizma <u>None</u> Other		✓	/
If Chlorinated or Drinking Water Samples, Acceptable Preservation?			/

Comments: ① Reconciled with the typed label  
 ② Reconciled with the Handwritten label.

Verified by/Date: 1602/08/21

## QC SUMMARY REPORT

**SOILS & ENGINEERING SERVICES**

**SDG #:** 0

**Folder #:** 159556

**Project Name:** TRUAX FIELD

**Project #:** XGFG 182011

### *Lab Control Spike Soil*

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOLID		
CTLab #:	531234	Analysis Time:	09:14	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C		
Parent Sample #:		Analyst:	RLD	Prep Analyst:	KMT				
<hr/>									
Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	0.514	mg/kg			0.500	103	70 --- 130	20	
1,1,1-Trichloroethane	0.479	mg/kg			0.500	96	70 --- 130	20	
1,1,2,2-Tetrachloroethane	0.496	mg/kg			0.500	99	70 --- 130	20	
1,1,2-Trichloroethane	0.511	mg/kg			0.500	102	70 --- 130	20	
1,1-Dichloroethane	0.501	mg/kg			0.500	100	70 --- 130	20	
1,1-Dichloroethene	0.473	mg/kg			0.500	95	67 --- 130	20	
1,1-Dichloropropene	0.509	mg/kg			0.500	102	70 --- 130	20	
1,2 Dichloroethane-d4	99.0	% Recovery			100	99.0	70 --- 130		
1,2,3-Trichlorobenzene	0.492	mg/kg			0.500	98	70 --- 130	20	
1,2,3-Trichloropropane	0.519	mg/kg			0.500	104	68 --- 130	20	
1,2,4-Trichlorobenzene	0.515	mg/kg			0.500	103	70 --- 130	20	
1,2,4-Trimethylbenzene	0.499	mg/kg			0.500	100	70 --- 130	20	
1,2-Dibromo-3-chloropropane	0.489	mg/kg			0.500	98	60 --- 131	20	
1,2-Dibromoethane	0.492	mg/kg			0.500	98	70 --- 130	20	
1,2-Dichlorobenzene	0.496	mg/kg			0.500	99	70 --- 130	20	
1,2-Dichloroethane	0.487	mg/kg			0.500	97	70 --- 130	20	
1,2-Dichloropropane	0.512	mg/kg			0.500	102	70 --- 130	20	
1,3,5-Trimethylbenzene	0.500	mg/kg			0.500	100	70 --- 130	20	
1,3-Dichlorobenzene	0.495	mg/kg			0.500	99	70 --- 130	20	
1,3-Dichloropropane	0.493	mg/kg			0.500	99	70 --- 130	20	
1,4-Dichlorobenzene	0.491	mg/kg			0.500	98	70 --- 130	20	
2,2-Dichloropropane	0.528	mg/kg			0.500	106	57 --- 135	20	
2-Butanone	4.96	mg/kg			5.00	99	70 --- 130	20	
2-Chlorotoluene	0.503	mg/kg			0.500	101	70 --- 130	20	
2-Hexanone	5.30	mg/kg			5.00	106	70 --- 134	20	
4-Chlorotoluene	0.491	mg/kg			0.500	98	70 --- 130	20	
4-Methyl-2-pentanone	5.23	mg/kg			5.00	105	70 --- 130	20	
Acetone	5.48	mg/kg			5.00	110	63 --- 139	20	
Benzene	0.505	mg/kg			0.500	101	70 --- 130	20	
Bromobenzene	0.487	mg/kg			0.500	97	70 --- 130	20	
Bromochloromethane	0.464	mg/kg			0.500	93	70 --- 130	20	
Bromodichloromethane	0.503	mg/kg			0.500	101	70 --- 130	20	
Bromofluorobenzene	101	% Recovery			100	101	70 --- 130		
Bromoform	0.512	mg/kg			0.500	102	70 --- 130	20	
Bromomethane	0.581	mg/kg			0.500	116	9 --- 149	20	

***Lab Control Spike Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOLID		
CTLab #:	531234	Analysis Time:	09:14	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C		
Parent Sample #:		Analyst:	RLD	Prep Analyst:	KMT				
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Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
Carbon disulfide	1.04	mg/kg			1.00	104	64 --- 136	20	
Carbon tetrachloride	0.514	mg/kg			0.500	103	70 --- 130	20	
Chlorobenzene	0.501	mg/kg			0.500	100	70 --- 130	20	
Chloroethane	0.478	mg/kg			0.500	96	38 --- 153	20	
Chloroform	0.491	mg/kg			0.500	98	70 --- 130	20	
Chloromethane	0.528	mg/kg			0.500	106	70 --- 130	20	
cis-1,2-Dichloroethene	0.495	mg/kg			0.500	99	70 --- 130	20	
cis-1,3-Dichloropropene	0.498	mg/kg			0.500	100	70 --- 130	20	
d8-Toluene	100	% Recovery			100	100	70 --- 130	20	
Dibromochloromethane	0.503	mg/kg			0.500	101	70 --- 130	20	
Dibromofluoromethane	100	% Recovery			100	100	70 --- 130	20	
Dibromomethane	0.493	mg/kg			0.500	99	70 --- 130	20	
Dichlorodifluoromethane	0.503	mg/kg			0.500	101	70 --- 130	20	
Diisopropyl ether	0.525	mg/kg			0.500	105	70 --- 130	20	
Ethylbenzene	0.505	mg/kg			0.500	101	70 --- 130	20	
Hexachlorobutadiene	0.509	mg/kg			0.500	102	70 --- 130	20	
Isopropylbenzene	0.507	mg/kg			0.500	101	70 --- 130	20	
m & p-Xylene	0.994	mg/kg			1.00	99	70 --- 130	20	
Methyl tert-butyl ether	0.484	mg/kg			0.500	97	70 --- 130	20	
Methylene chloride	0.498	mg/kg			0.500	100	70 --- 130	20	
n-Butylbenzene	0.510	mg/kg			0.500	102	70 --- 130	20	
n-Propylbenzene	0.510	mg/kg			0.500	102	70 --- 130	20	
Naphthalene	0.506	mg/kg			0.500	101	70 --- 130	20	
o-Xylene	0.492	mg/kg			0.500	98	70 --- 130	20	
p-Isopropyltoluene	0.500	mg/kg			0.500	100	70 --- 130	20	
sec-Butylbenzene	0.511	mg/kg			0.500	102	70 --- 130	20	
Styrene	0.508	mg/kg			0.500	102	70 --- 130	20	
tert-Butylbenzene	0.497	mg/kg			0.500	99	70 --- 130	20	
Tetrachloroethene	0.487	mg/kg			0.500	97	70 --- 130	20	
Tetrahydrofuran	5.04	mg/kg			5.00	101	70 --- 130	20	
Toluene	0.500	mg/kg			0.500	100	70 --- 130	20	
trans-1,2-Dichloroethene	0.498	mg/kg			0.500	100	61 --- 132	20	
trans-1,3-Dichloropropene	0.519	mg/kg			0.500	104	70 --- 130	20	
Trichloroethene	0.491	mg/kg			0.500	98	70 --- 130	20	
Trichlorofluoromethane	0.496	mg/kg			0.500	99	5 --- 154	20	
Vinyl chloride	0.503	mg/kg			0.500	101	70 --- 131	20	

***Method Blank Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOLID
CTLab #:	531233	Analysis Time:	10:13	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C
Parent Sample #:		Analyst:	RLD	Prep Analyst:	KMT		

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	0.060	mg/kg		U	0		0.060		
1,1,1-Trichloroethane	0.016	mg/kg		U	0		0.016		
1,1,2,2-Tetrachloroethane	0.021	mg/kg		U	0		0.021		
1,1,2-Trichloroethane	0.012	mg/kg		U	0		0.012		
1,1-Dichloroethane	0.007	mg/kg		U	0		0.007		
1,1-Dichloroethene	0.021	mg/kg		U	0		0.021		
1,1-Dichloropropene	0.027	mg/kg		U	0		0.027		
1,2 Dichloroethane-d4	99.0	% Recovery			100	99.0	78	---	118
1,2,3-Trichlorobenzene	0.011	mg/kg		U	0		0.011		
1,2,3-Trichloropropane	0.040	mg/kg		U	0		0.040		
1,2,4-Trichlorobenzene	0.017	mg/kg		U	0		0.017		
1,2,4-Trimethylbenzene	0.011	mg/kg		U	0		0.011		
1,2-Dibromo-3-chloropropane	0.070	mg/kg		U	0		0.070		
1,2-Dibromoethane	0.011	mg/kg		U	0		0.011		
1,2-Dichlorobenzene	0.015	mg/kg		U	0		0.015		
1,2-Dichloroethane	0.022	mg/kg		U	0		0.022		
1,2-Dichloropropane	0.026	mg/kg		U	0		0.026		
1,3,5-Trimethylbenzene	0.013	mg/kg		U	0		0.013		
1,3-Dichlorobenzene	0.014	mg/kg		U	0		0.014		
1,3-Dichloropropane	0.014	mg/kg		U	0		0.014		
1,4-Dichlorobenzene	0.015	mg/kg		U	0		0.015		
2,2-Dichloropropane	0.021	mg/kg		U	0		0.021		
2-Butanone	0.400	mg/kg		U	0		0.400		
2-Chlorotoluene	0.018	mg/kg		U	0		0.018		
2-Hexanone	0.200	mg/kg		U	0		0.200		
4-Chlorotoluene	0.015	mg/kg		U	0		0.015		
4-Methyl-2-pentanone	0.180	mg/kg		U	0		0.180		
Acetone	0.400	mg/kg		U	0		0.400		
Benzene	0.011	mg/kg		U	0		0.011		
Bromobenzene	0.016	mg/kg		U	0		0.016		
Bromochloromethane	0.017	mg/kg		U	0		0.017		
Bromodichloromethane	0.014	mg/kg		U	0		0.014		
Bromofluorobenzene	101	% Recovery			100	101	83	---	132
Bromoform	0.060	mg/kg		U	0		0.060		
Bromomethane	0.090	mg/kg		U	0		0.090		
Carbon disulfide	0.040	mg/kg		U	0		0.040		
Carbon tetrachloride	0.014	mg/kg		U	0		0.014		
Chlorobenzene	0.010	mg/kg		U	0		0.010		
Chloroethane	0.030	mg/kg		U	0		0.030		
Chloroform	0.016	mg/kg		U	0		0.016		
Chloromethane	0.030	mg/kg		U	0		0.030		
cis-1,2-Dichloroethene	0.027	mg/kg		U	0		0.027		

***Method Blank Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOLID		
CTLab #:	531233	Analysis Time:	10:13	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C		
Parent Sample #:		Analyst:	RLD	Prep Analyst:	KMT				
<hr/>									
Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
cis-1,3-Dichloropropene	0.014	mg/kg		U	0			0.014	
d8-Toluene	100	% Recovery			100	100	82	---	124
Dibromochloromethane	0.040	mg/kg		U	0			0.040	
Dibromofluoromethane	97.0	% Recovery			100	97.0	79	---	119
Dibromomethane	0.021	mg/kg		U	0			0.021	
Dichlorodifluoromethane	0.050	mg/kg		U	0			0.050	
Diisopropyl ether	0.018	mg/kg		U	0			0.018	
Ethylbenzene	0.011	mg/kg		U	0			0.011	
Hexachlorobutadiene	0.023	mg/kg		U	0			0.023	
Isopropylbenzene	0.013	mg/kg		U	0			0.013	
m & p-Xylene	0.025	mg/kg		U	0			0.025	
Methyl tert-butyl ether	0.016	mg/kg		U	0			0.016	
Methylene chloride	0.060	mg/kg		U	0			0.060	
n-Butylbenzene	0.017	mg/kg		U	0			0.017	
n-Propylbenzene	0.013	mg/kg		U	0			0.013	
Naphthalene	0.015	mg/kg		U	0			0.015	
o-Xylene	0.007	mg/kg		U	0			0.007	
p-Isopropyltoluene	0.013	mg/kg		U	0			0.013	
sec-Butylbenzene	0.011	mg/kg		U	0			0.011	
Styrene	0.016	mg/kg		U	0			0.016	
tert-Butylbenzene	0.012	mg/kg		U	0			0.012	
Tetrachloroethene	0.011	mg/kg		U	0			0.011	
Tetrahydrofuran	0.250	mg/kg		U	0			0.250	
Toluene	0.016	mg/kg		U	0			0.016	
trans-1,2-Dichloroethene	0.014	mg/kg		U	0			0.014	
trans-1,3-Dichloropropene	0.040	mg/kg		U	0			0.040	
Trichloroethene	0.019	mg/kg		U	0			0.019	
Trichlorofluoromethane	0.040	mg/kg		U	0			0.040	
Vinyl chloride	0.019	mg/kg		U	0			0.019	

**Matrix Spike Duplicate Soil**

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOIL
CTLab #:	531232	Analysis Time:	19:20	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C
Parent Sample #:	531231	Analyst:	RLD	Prep Analyst:	KMT		

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	0.544	mg/kg	BDL		0.531	102	70 --- 130	2	20
1,1,1-Trichloroethane	0.523	mg/kg	BDL		0.531	98	70 --- 130	2	20
1,1,2,2-Tetrachloroethane	0.429	mg/kg	BDL		0.531	81	39 --- 130	4	20
1,1,2-Trichloroethane	0.566	mg/kg	BDL		0.531	107	70 --- 130	5	20
1,1-Dichloroethane	0.555	mg/kg	BDL		0.531	105	70 --- 130	1	21
1,1-Dichloroethene	0.518	mg/kg	BDL		0.531	98	70 --- 130	2	20
1,1-Dichloropropene	0.523	mg/kg	BDL		0.531	98	70 --- 130	1	20
1,2 Dichloroethane-d4	98.0	% Recovery			100	98.0	70 --- 130		
1,2,3-Trichlorobenzene	0.523	mg/kg	BDL		0.531	98	70 --- 130	1	47
1,2,3-Trichloropropane	0.552	mg/kg	BDL		0.531	104	70 --- 130	1	20
1,2,4-Trichlorobenzene	0.528	mg/kg	BDL		0.531	99	70 --- 130	1	35
1,2,4-Trimethylbenzene	0.544	mg/kg	BDL		0.531	102	70 --- 130	2	20
1,2-Dibromo-3-chloropropane	0.506	mg/kg	BDL		0.531	95	61 --- 130	1	29
1,2-Dibromoethane	0.547	mg/kg	BDL		0.531	103	70 --- 130	3	20
1,2-Dichlorobenzene	0.525	mg/kg	BDL		0.531	99	70 --- 130	0	20
1,2-Dichloroethane	0.538	mg/kg	BDL		0.531	101	70 --- 130	1	20
1,2-Dichloropropane	0.574	mg/kg	BDL		0.531	108	70 --- 130	1	20
1,3,5-Trimethylbenzene	0.530	mg/kg	BDL		0.531	100	70 --- 130	1	20
1,3-Dichlorobenzene	0.527	mg/kg	BDL		0.531	99	70 --- 130	3	20
1,3-Dichloropropane	0.553	mg/kg	BDL		0.531	104	70 --- 130	0	20
1,4-Dichlorobenzene	0.519	mg/kg	BDL		0.531	98	70 --- 130	0	20
2,2-Dichloropropane	0.470	mg/kg	BDL		0.531	89	62 --- 130	2	33
2-Butanone	5.62	mg/kg	BDL		5.31	106	70 --- 130	2	24
2-Chlorotoluene	0.537	mg/kg	BDL		0.531	101	70 --- 130	1	20
2-Hexanone	5.59	mg/kg	BDL		5.31	105	70 --- 130	1	25
4-Chlorotoluene	0.534	mg/kg	BDL		0.531	101	70 --- 130	1	20
4-Methyl-2-pentanone	5.57	mg/kg	BDL		5.31	105	70 --- 130	0	21
Acetone	6.08	mg/kg	BDL		5.31	115	70 --- 139	0	50
Benzene	0.556	mg/kg	BDL		0.531	105	70 --- 130	2	24
Bromobenzene	0.518	mg/kg	BDL		0.531	98	70 --- 130	2	20
Bromochloromethane	0.517	mg/kg	BDL		0.531	97	70 --- 131	1	20
Bromodichloromethane	0.549	mg/kg	BDL		0.531	103	70 --- 130	1	20
Bromofluorobenzene	100	% Recovery			100	100	70 --- 130		
Bromoform	0.512	mg/kg	BDL		0.531	96	70 --- 130	2	20
Bromomethane	0.555	mg/kg	BDL		0.531	105	1 --- 288	13	35
Carbon disulfide	1.09	mg/kg	BDL		1.06	103	70 --- 130	1	22
Carbon tetrachloride	0.548	mg/kg	BDL		0.531	103	65 --- 133	4	20
Chlorobenzene	0.522	mg/kg	BDL		0.531	98	70 --- 130	2	20
Chloroethane	0.546	mg/kg	BDL		0.531	103	39 --- 162	5	35
Chloroform	0.547	mg/kg	BDL		0.531	103	70 --- 130	1	20
Chloromethane	0.591	mg/kg	BDL		0.531	111	68 --- 144	0	25
cis-1,2-Dichloroethene	0.528	mg/kg	BDL		0.531	99	70 --- 130	3	20

***Matrix Spike Duplicate Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOIL		
CTLab #:	531232	Analysis Time:	19:20	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C		
Parent Sample #:	531231	Analyst:	RLD	Prep Analyst:	KMT				
<hr/>									
Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
cis-1,3-Dichloropropene	0.533	mg/kg	BDL		0.531	100	70 --- 130	0	20
d8-Toluene	100	% Recovery			100	100	70 --- 130		
Dibromochloromethane	0.523	mg/kg	BDL		0.531	98	63 --- 130	0	20
Dibromofluoromethane	98.0	% Recovery			100	98.0	70 --- 130		
Dibromomethane	0.540	mg/kg	BDL		0.531	102	70 --- 130	0	20
Dichlorodifluoromethane	0.521	mg/kg	BDL		0.531	98	70 --- 140	2	20
Diisopropyl ether	0.519	mg/kg	BDL		0.531	98	76 --- 124	1	28
Ethylbenzene	0.536	mg/kg	BDL		0.531	101	70 --- 130	3	24
Hexachlorobutadiene	0.526	mg/kg	BDL		0.531	99	70 --- 130	0	23
Isopropylbenzene	0.527	mg/kg	BDL		0.531	99	70 --- 130	0	20
m & p-Xylene	1.07	mg/kg	BDL		1.06	101	70 --- 130	2	20
Methyl tert-butyl ether	0.536	mg/kg	BDL		0.531	101	70 --- 130	2	26
Methylene chloride	0.568	mg/kg	BDL		0.531	107	46 --- 138	1	24
n-Butylbenzene	0.535	mg/kg	BDL		0.531	101	70 --- 130	2	20
n-Propylbenzene	0.532	mg/kg	BDL		0.531	100	70 --- 130	1	20
Naphthalene	0.539	mg/kg	BDL		0.531	102	70 --- 130	1	20
o-Xylene	0.529	mg/kg	BDL		0.531	100	70 --- 130	3	24
p-Isopropyltoluene	0.524	mg/kg	BDL		0.531	99	70 --- 130	1	20
sec-Butylbenzene	0.534	mg/kg	BDL		0.531	101	70 --- 130	1	20
Styrene	0.534	mg/kg	BDL		0.531	101	70 --- 130	1	20
tert-Butylbenzene	0.531	mg/kg	BDL		0.531	100	70 --- 130	2	20
Tetrachloroethene	0.521	mg/kg	BDL		0.531	98	65 --- 135	4	20
Tetrahydrofuran	5.33	mg/kg	BDL		5.31	100	70 --- 130	2	35
Toluene	0.543	mg/kg	BDL		0.531	102	70 --- 130	2	24
trans-1,2-Dichloroethene	0.525	mg/kg	BDL		0.531	99	70 --- 130	1	22
trans-1,3-Dichloropropene	0.541	mg/kg	BDL		0.531	102	70 --- 130	1	20
Trichloroethene	0.620	mg/kg	BDL		0.531	117	45 --- 196	2	20
Trichlorofluoromethane	1.30	mg/kg	BDL		0.531	245	1 --- 228	0	64
Vinyl chloride	0.572	mg/kg	BDL		0.531	108	70 --- 146	1	20

***Matrix Spike Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOIL
CTLab #:	531231	Analysis Time:	18:50	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C
Parent Sample #:	530671	Analyst:	RLD	Prep Analyst:	KMT		

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	0.533	mg/kg	BDL		0.531	100	70 --- 130		
1,1,1-Trichloroethane	0.515	mg/kg	BDL		0.531	97	70 --- 130		
1,1,2,2-Tetrachloroethane	0.447	mg/kg	BDL		0.531	84	39 --- 130		
1,1,2-Trichloroethane	0.540	mg/kg	BDL		0.531	102	70 --- 130		
1,1-Dichloroethane	0.549	mg/kg	BDL		0.531	103	70 --- 130		
1,1-Dichloroethene	0.510	mg/kg	BDL		0.531	96	70 --- 130		
1,1-Dichloropropene	0.529	mg/kg	BDL		0.531	100	70 --- 130		
1,2 Dichloroethane-d4	98.0	% Recovery			100	98.0	70 --- 130		
1,2,3-Trichlorobenzene	0.527	mg/kg	BDL		0.531	99	70 --- 130		
1,2,3-Trichloropropane	0.544	mg/kg	BDL		0.531	102	70 --- 130		
1,2,4-Trichlorobenzene	0.524	mg/kg	BDL		0.531	99	70 --- 130		
1,2,4-Trimethylbenzene	0.531	mg/kg	BDL		0.531	100	70 --- 130		
1,2-Dibromo-3-chloropropane	0.499	mg/kg	BDL		0.531	94	61 --- 130		
1,2-Dibromoethane	0.531	mg/kg	BDL		0.531	100	70 --- 130		
1,2-Dichlorobenzene	0.525	mg/kg	BDL		0.531	99	70 --- 130		
1,2-Dichloroethane	0.530	mg/kg	BDL		0.531	100	70 --- 130		
1,2-Dichloropropane	0.569	mg/kg	BDL		0.531	107	70 --- 130		
1,3,5-Trimethylbenzene	0.527	mg/kg	BDL		0.531	99	70 --- 130		
1,3-Dichlorobenzene	0.511	mg/kg	BDL		0.531	96	70 --- 130		
1,3-Dichloropropane	0.555	mg/kg	BDL		0.531	105	70 --- 130		
1,4-Dichlorobenzene	0.517	mg/kg	BDL		0.531	97	70 --- 130		
2,2-Dichloropropane	0.480	mg/kg	BDL		0.531	90	62 --- 130		
2-Butanone	5.72	mg/kg	BDL		5.31	108	70 --- 130		
2-Chlorotoluene	0.532	mg/kg	BDL		0.531	100	70 --- 130		
2-Hexanone	5.53	mg/kg	BDL		5.31	104	70 --- 130		
4-Chlorotoluene	0.529	mg/kg	BDL		0.531	100	70 --- 130		
4-Methyl-2-pentanone	5.59	mg/kg	BDL		5.31	105	70 --- 130		
Acetone	6.10	mg/kg	BDL		5.31	115	70 --- 139		
Benzene	0.545	mg/kg	BDL		0.531	103	70 --- 130		
Bromobenzene	0.509	mg/kg	BDL		0.531	96	70 --- 130		
Bromochloromethane	0.514	mg/kg	BDL		0.531	97	70 --- 131		
Bromodichloromethane	0.542	mg/kg	BDL		0.531	102	70 --- 130		
Bromofluorobenzene	99.0	% Recovery			100	99.0	70 --- 130		
Bromoform	0.524	mg/kg	BDL		0.531	99	70 --- 130		
Bromomethane	0.632	mg/kg	BDL		0.531	119	1 --- 288		
Carbon disulfide	1.08	mg/kg	BDL		1.06	102	70 --- 130		
Carbon tetrachloride	0.528	mg/kg	BDL		0.531	99	65 --- 133		
Chlorobenzene	0.512	mg/kg	BDL		0.531	96	70 --- 130		
Chloroethane	0.574	mg/kg	BDL		0.531	108	39 --- 162		
Chloroform	0.541	mg/kg	BDL		0.531	102	70 --- 130		
Chloromethane	0.593	mg/kg	BDL		0.531	112	68 --- 144		
cis-1,2-Dichloroethene	0.513	mg/kg	BDL		0.531	97	70 --- 130		

***Matrix Spike Soil***

Analytical Run #:	179187	Analysis Date:	02/05/2021	Prep Batch #:	79900	Matrix:	SOIL
CTLab #:	531231	Analysis Time:	18:50	Prep Date/Time:	02/04/2021 13:15	Method:	SW8260C
Parent Sample #:	530671	Analyst:	RLD	Prep Analyst:	KMT		

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
cis-1,3-Dichloropropene	0.535	mg/kg	BDL		0.531	101	70 --- 130		
d8-Toluene	101	% Recovery			100	101	70 --- 130		
Dibromochloromethane	0.521	mg/kg	BDL		0.531	98	63 --- 130		
Dibromofluoromethane	99.0	% Recovery			100	99.0	70 --- 130		
Dibromomethane	0.541	mg/kg	BDL		0.531	102	70 --- 130		
Dichlorodifluoromethane	0.529	mg/kg	BDL		0.531	100	70 --- 140		
Diisopropyl ether	0.525	mg/kg	BDL		0.531	99	76 --- 124		
Ethylbenzene	0.521	mg/kg	BDL		0.531	98	70 --- 130		
Hexachlorobutadiene	0.527	mg/kg	BDL		0.531	99	70 --- 130		
Isopropylbenzene	0.528	mg/kg	BDL		0.531	99	70 --- 130		
m & p-Xylene	1.05	mg/kg	BDL		1.06	99	70 --- 130		
Methyl tert-butyl ether	0.527	mg/kg	BDL		0.531	99	70 --- 130		
Methylene chloride	0.562	mg/kg	BDL		0.531	106	46 --- 138		
n-Butylbenzene	0.543	mg/kg	BDL		0.531	102	70 --- 130		
n-Propylbenzene	0.529	mg/kg	BDL		0.531	100	70 --- 130		
Naphthalene	0.535	mg/kg	BDL		0.531	101	70 --- 130		
o-Xylene	0.514	mg/kg	BDL		0.531	97	70 --- 130		
p-Isopropyltoluene	0.521	mg/kg	BDL		0.531	98	70 --- 130		
sec-Butylbenzene	0.528	mg/kg	BDL		0.531	99	70 --- 130		
Styrene	0.527	mg/kg	BDL		0.531	99	70 --- 130		
tert-Butylbenzene	0.519	mg/kg	BDL		0.531	98	70 --- 130		
Tetrachloroethene	0.503	mg/kg	BDL		0.531	95	65 --- 135		
Tetrahydrofuran	5.24	mg/kg	BDL		5.31	99	70 --- 130		
Toluene	0.529	mg/kg	BDL		0.531	100	70 --- 130		
trans-1,2-Dichloroethene	0.519	mg/kg	BDL		0.531	98	70 --- 130		
trans-1,3-Dichloropropene	0.534	mg/kg	BDL		0.531	101	70 --- 130		
Trichloroethene	0.606	mg/kg	BDL		0.531	114	45 --- 196		
Trichlorofluoromethane	1.30	mg/kg	BDL		0.531	245	1 --- 228		
Vinyl chloride	0.569	mg/kg	BDL		0.531	107	70 --- 146		

***Lab Control Spike Water***

Analytical Run #:	179222	Analysis Date:	02/09/2021	Prep Batch #:		Matrix:	LIQUID
CTLab #:	532291	Analysis Time:	09:03	Prep Date/Time:		Method:	SW8260C
Parent Sample #:		Analyst:	DGS	Prep Analyst:			

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	9.39	ug/L			10.0	94	86 --- 112	20	
1,1,1-Trichloroethane	11.1	ug/L			10.0	111	88 --- 120	20	
1,1,2,2-Tetrachloroethane	8.75	ug/L			10.0	88	83 --- 116	20	
1,1,2-Trichloroethane	10.3	ug/L			10.0	103	86 --- 115	20	
1,1-Dichloroethane	10.2	ug/L			10.0	102	86 --- 117	20	
1,1-Dichloroethene	10.6	ug/L			10.0	106	86 --- 119	20	
1,1-Dichloropropene	10.1	ug/L			10.0	101	87 --- 117	20	
1,2 Dichloroethane-d4	93.0	% Recovery			100	93.0	90 --- 111		
1,2,3-Trichlorobenzene	8.60	ug/L			10.0	86	81 --- 114	20	
1,2,3-Trichloropropane	9.44	ug/L			10.0	94	77 --- 120	20	
1,2,4-Trichlorobenzene	9.12	ug/L			10.0	91	80 --- 116	20	
1,2,4-Trimethylbenzene	9.53	ug/L			10.0	95	91 --- 118	20	
1,2-Dibromo-3-chloropropane	9.98	ug/L			10.0	100	68 --- 122	20	
1,2-Dibromoethane	9.82	ug/L			10.0	98	87 --- 113	20	
1,2-Dichlorobenzene	9.16	ug/L			10.0	92	88 --- 113	20	
1,2-Dichloroethane	9.93	ug/L			10.0	99	84 --- 120	20	
1,2-Dichloropropane	10.4	ug/L			10.0	104	85 --- 116	20	
1,3,5-Trimethylbenzene	9.45	ug/L			10.0	94	90 --- 119	20	
1,3-Dichlorobenzene	9.12	ug/L			10.0	91	89 --- 113	20	
1,3-Dichloropropane	9.99	ug/L			10.0	100	87 --- 115	20	
1,4-Dichlorobenzene	8.87	ug/L			10.0	89	87 --- 113	20	
2,2-Dichloropropane	11.3	ug/L			10.0	113	75 --- 127	20	
2-Butanone	115	ug/L			100	115	68 --- 133	20	
2-Chlorotoluene	9.30	ug/L			10.0	93	88 --- 117	20	
2-Hexanone	101	ug/L			100	101	71 --- 134	20	
4-Chlorotoluene	9.23	ug/L			10.0	92	88 --- 119	20	
4-Methyl-2-pentanone	108	ug/L			100	108	78 --- 127	20	
Acetone	120	ug/L			100	120	66 --- 137	20	
Benzene	10.3	ug/L			10.0	103	90 --- 119	20	
Bromobenzene	8.74	ug/L			10.0	87	86 --- 113	20	
Bromochloromethane	9.47	ug/L			10.0	95	81 --- 120	20	
Bromodichloromethane	10.1	ug/L			10.0	101	87 --- 116	20	
Bromofluorobenzene	97.0	% Recovery			100	97.0	88 --- 108		
Bromoform	9.56	ug/L			10.0	96	72 --- 124	20	
Bromomethane	11.4	ug/L			10.0	114	40 --- 169	20	
Carbon disulfide	20.9	ug/L			20.0	104	89 --- 124	20	
Carbon tetrachloride	11.4	ug/L			10.0	114	82 --- 127	20	
Chlorobenzene	9.17	ug/L			10.0	92	89 --- 114	20	
Chloroethane	9.75	ug/L			10.0	98	78 --- 128	20	
Chloroform	9.51	ug/L			10.0	95	88 --- 115	20	
Chloromethane	9.93	ug/L			10.0	99	63 --- 135	20	
cis-1,2-Dichloroethene	9.97	ug/L			10.0	100	87 --- 115	20	

***Lab Control Spike Water***

Analytical Run #:	179222	Analysis Date:	02/09/2021	Prep Batch #:		Matrix:	LIQUID
CTLab #:	532291	Analysis Time:	09:03	Prep Date/Time:		Method:	SW8260C
Parent Sample #:		Analyst:	DGS	Prep Analyst:			

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
cis-1,3-Dichloropropene	10.3	ug/L			10.0	103	86 --- 115	20	
d8-Toluene	104	% Recovery			100	104	95 --- 105		
Dibromochloromethane	9.33	ug/L			10.0	93	82 --- 117	20	
Dibromofluoromethane	99.0	% Recovery			100	99.0	92 --- 107		
Dibromomethane	9.78	ug/L			10.0	98	84 --- 115	20	
Dichlorodifluoromethane	11.1	ug/L			10.0	111	76 --- 129	20	
Diisopropyl ether	10.3	ug/L			10.0	103	82 --- 123	20	
Ethylbenzene	9.79	ug/L			10.0	98	92 --- 119	20	
Hexachlorobutadiene	9.66	ug/L			10.0	97	84 --- 120	20	
Isopropylbenzene	9.97	ug/L			10.0	100	91 --- 121	20	
m & p-Xylene	19.1	ug/L			20.0	96	91 --- 117	20	
Methyl tert-butyl ether	10.5	ug/L			10.0	105	85 --- 115	20	
Methylene chloride	9.98	ug/L			10.0	100	71 --- 128	20	
n-Butylbenzene	9.65	ug/L			10.0	96	88 --- 122	20	
n-Propylbenzene	9.23	ug/L			10.0	92	90 --- 123	20	
Naphthalene	9.34	ug/L			10.0	93	64 --- 129	20	
o-Xylene	9.24	ug/L			10.0	92	89 --- 115	20	
p-Isopropyltoluene	9.56	ug/L			10.0	96	91 --- 119	20	
sec-Butylbenzene	9.96	ug/L			10.0	100	92 --- 122	20	
Styrene	9.44	ug/L			10.0	94	90 --- 116	20	
tert-Butylbenzene	9.47	ug/L			10.0	95	90 --- 118	20	
Tetrachloroethene	10.0	ug/L			10.0	100	86 --- 120	20	
Tetrahydrofuran	106	ug/L			100	106	72 --- 135	20	
Toluene	10.2	ug/L			10.0	102	89 --- 117	20	
trans-1,2-Dichloroethene	10.1	ug/L			10.0	101	86 --- 116	20	
trans-1,3-Dichloropropene	10.2	ug/L			10.0	102	84 --- 115	20	
Trichloroethene	10.3	ug/L			10.0	103	86 --- 117	20	
Trichlorofluoromethane	11.0	ug/L			10.0	110	83 --- 133	20	
Vinyl chloride	10.6	ug/L			10.0	106	84 --- 124	20	

***Method Blank Water***

Analytical Run #:	179222	Analysis Date:	02/09/2021	Prep Batch #:		Matrix:	LIQUID
CTLab #:	532394	Analysis Time:	11:23	Prep Date/Time:		Method:	SW8260C
Parent Sample #:		Analyst:	DGS	Prep Analyst:			

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	0.4	ug/L		U	0		0.4		
1,1,1-Trichloroethane	0.29	ug/L		U	0		0.29		
1,1,2,2-Tetrachloroethane	0.3	ug/L		U	0		0.3		
1,1,2-Trichloroethane	0.30	ug/L		U	0		0.30		
1,1-Dichloroethane	0.3	ug/L		U	0		0.3		
1,1-Dichloroethene	0.4	ug/L		U	0		0.4		
1,1-Dichloropropene	0.3	ug/L		U	0		0.3		
1,2 Dichloroethane-d4	100	% Recovery			100	100	83 --- 116		
1,2,3-Trichlorobenzene	0.23	ug/L		U	0		0.23		
1,2,3-Trichloropropane	0.3	ug/L		U	0		0.3		
1,2,4-Trichlorobenzene	0.28	ug/L		U	0		0.28		
1,2,4-Trimethylbenzene	0.29	ug/L		U	0		0.29		
1,2-Dibromo-3-chloropropane	0.25	ug/L		U	0		0.25		
1,2-Dibromoethane	0.3	ug/L		U	0		0.3		
1,2-Dichlorobenzene	0.3	ug/L		U	0		0.3		
1,2-Dichloroethane	0.24	ug/L		U	0		0.24		
1,2-Dichloropropane	0.18	ug/L		U	0		0.18		
1,3,5-Trimethylbenzene	0.27	ug/L		U	0		0.27		
1,3-Dichlorobenzene	0.26	ug/L		U	0		0.26		
1,3-Dichloropropane	0.17	ug/L		U	0		0.17		
1,4-Dichlorobenzene	0.3	ug/L		U	0		0.3		
2,2-Dichloropropane	0.30	ug/L		U	0		0.30		
2-Butanone	2.6	ug/L		U	0		2.6		
2-Chlorotoluene	0.25	ug/L		U	0		0.25		
2-Hexanone	3	ug/L		U	0		3		
4-Chlorotoluene	0.3	ug/L		U	0		0.3		
4-Methyl-2-pentanone	2.2	ug/L		U	0		2.2		
Acetone	4	ug/L		U	0		4		
Benzene	0.4	ug/L		U	0		0.4		
Bromobenzene	0.4	ug/L		U	0		0.4		
Bromochloromethane	0.30	ug/L		U	0		0.30		
Bromodichloromethane	0.29	ug/L		U	0		0.29		
Bromofluorobenzene	104	% Recovery			100	104	80 --- 129		
Bromoform	0.4	ug/L		U	0		0.4		
Bromomethane	0.9	ug/L		U	0		0.9		
Carbon disulfide	0.6	ug/L		U	0		0.6		
Carbon tetrachloride	0.3	ug/L		U	0		0.3		
Chlorobenzene	0.3	ug/L		U	0		0.3		
Chloroethane	0.5	ug/L		U	0		0.5		
Chloroform	0.3	ug/L		U	0		0.3		
Chloromethane	0.6	ug/L		U	0		0.6		
cis-1,2-Dichloroethene	0.3	ug/L		U	0		0.3		

***Method Blank Water***

Analytical Run #:	179222	Analysis Date:	02/09/2021	Prep Batch #:		Matrix:	LIQUID
CTLab #:	532394	Analysis Time:	11:23	Prep Date/Time:		Method:	SW8260C
Parent Sample #:		Analyst:	DGS	Prep Analyst:			

Analyte	QC sample result	Units	Parent sample result	Qualifier(s)	Spike Amount Added	% Recovery	Control Limits	RPD	RPD Limit
cis-1,3-Dichloropropene	0.16	ug/L		U	0		0.16		
d8-Toluene	104	% Recovery			100	104	85 --- 117		
Dibromochloromethane	0.3	ug/L		U	0		0.3		
Dibromofluoromethane	104	% Recovery			100	104	85 --- 115		
Dibromomethane	0.22	ug/L		U	0		0.22		
Dichlorodifluoromethane	0.4	ug/L		U	0		0.4		
Diisopropyl ether	0.4	ug/L		U	0		0.4		
Ethylbenzene	0.3	ug/L		U	0		0.3		
Hexachlorobutadiene	0.4	ug/L		U	0		0.4		
Isopropylbenzene	0.3	ug/L		U	0		0.3		
m & p-Xylene	0.7	ug/L		U	0		0.7		
Methyl tert-butyl ether	0.3	ug/L		U	0		0.3		
Methylene chloride	0.4	ug/L		U	0		0.4		
n-Butylbenzene	0.29	ug/L		U	0		0.29		
n-Propylbenzene	0.3	ug/L		U	0		0.3		
Naphthalene	0.30	ug/L		U	0		0.30		
o-Xylene	0.26	ug/L		U	0		0.26		
p-Isopropyltoluene	0.3	ug/L		U	0		0.3		
sec-Butylbenzene	0.4	ug/L		U	0		0.4		
Styrene	0.29	ug/L		U	0		0.29		
tert-Butylbenzene	0.4	ug/L		U	0		0.4		
Tetrachloroethene	0.27	ug/L		U	0		0.27		
Tetrahydrofuran	3	ug/L		U	0		3		
Toluene	0.21	ug/L		U	0		0.21		
trans-1,2-Dichloroethene	0.3	ug/L		U	0		0.3		
trans-1,3-Dichloropropene	0.23	ug/L		U	0		0.23		
Trichloroethene	0.3	ug/L		U	0		0.3		
Trichlorofluoromethane	0.4	ug/L		U	0		0.4		
Vinyl chloride	0.14	ug/L		U	0		0.14		

B510

Rev. 02/2017

## CHAIN OF CUSTODY

SES #508.02

Page 1 of 2

Company: SOILS & ENGINEERING  
SERVICES

Project Contact: DUANE REICHEL

Telephone: 608-274-7600

Project Name: TRUAX FIELD

Project #: XGFG 182011

Location: ADAL BS10

Sampled By: GEOFF PRIOR

## CT LABORATORIES

1230 Lange Court, Baraboo, WI 53913  
608-356-2760 Fax 608-356-2766  
www.ctlaboratories.com

Folder #: 159556

Company: SOILS &amp; ENGINEERIN

Project: TRUAX FIELD

Logged By: ERC PM: ET

## Program:

QSM RCRA SDWA NPDES  
Solid Waste Other \_\_\_\_\_

PO #

Report To: DUANE REICHEL  
EMAIL:

Company: SES

Address: 1102 STEWALT ST.  
MADISON WI 53713

Invoice To:\*

EMAIL:

Company:

Address:

— SAME —

\*Party listed is responsible for payment of invoice as per CT Laboratories' terms and conditions

## Client Special Instructions

## Matrix:

GW - groundwater SW - surface water WW - wastewater DW - drinking water

S - soil/sediment SL - sludge

A - air

M - misc/waste

Filtered? Y/N

VOC 8260  
PFOS/PFOA

## ANALYSES REQUESTED

FIELD PIP

Total # Containers

Designated MS/MSD

Turnaround Time  
Normal RUSH\*

Date Needed: \_\_\_\_\_

Rush analysis requires prior  
CT Laboratories' approvalSurcharges:  
24 hr 200%2-3 days 100%  
4-9 days 50%CT Lab ID #  
Lab use only

Rev. 02/2017						CHAIN OF CUSTODY						SES #508.02						Page 1 of 2					
Company: SOILS & ENGINEERING SERVICES						Project Contact: DUANE REICHEL						Telephone: 608-274-7600						Project Name: TRUAX FIELD					
Project #: XGFG 182011						Location: ADAL BS10						Sampled By: GEOFF PRIOR											





159556

B510

SES#508-02

P2 of 2

## CHAIN OF CUSTODY

Project ID: X GFG 182011

PO#:

Sampler:

Geoff Prior  
(name)

## For Laboratory Use Only

Work Order #: \_\_\_\_\_ Temp: 39/4.4 °C  
Storage ID: \_\_\_\_\_ Storage Secured: Yes  No TAT Standard:  21 days(check one): Rush (surcharge may apply)  14 days  7 days Specify: \_\_\_\_\_

Geoff Prior

2-3-21 0940

ERC 2/3/21 946

Relinquished by (printed name and signature)

Date

Time

Received by (printed name and signature)

Date

Time

Dec 2/3/21 109

Relinquished by (printed name and signature)

Date

Time

Received by (printed name and signature)

Date

Time

SHIP TO: Vista Analytical Laboratory  
1104 Windfield Way  
El Dorado Hills, CA 95762  
(916) 673-1520 \* Fax (916) 673-0106

ATTN: \_\_\_\_\_

Method of Shipment:

Tracking No.: \_\_\_\_\_

Add Analysis(es) Requested

Container(s)

PFAS by  
Isotope  
DilutionEPA Method  
537 (DW only)

Quantity

Type

Matrix

PFOA/ PFOS

UICMR3 PFAS List:6

537.1 List: 14 or 18 (Circle One)

EPA Draft List of 24

OTHER:

Please attach analyte list

PFOA/ PFOS

UICMR3 PFAS List:6

537.1 List of 14

537.1 List of 18

Comments

Sample ID	Date	Time	Location/ Sample Description	P	SQ	X						
E510-1	2-1-21	1450	ADAL B510	2	P	AQ	X					
E510-2	2-1-21	1605		2	P	AQ	X					
E510-4	2-2-21	1435		2	P	AQ	X					
E510-4 S1, 2	2-2-21	1340		1	P	SD	X					
E510-4 S3, 10	2-2-21	1350		1	P	SD	X					
PUMP BLANK	2-2-21	1500		32	P	AQ	X					

Special Instructions/Comment

SEND  
DOCUMENTATION  
AND RESULTS TO:Name: DUANE REICHEL  
Company: SOILS + ENGINEERING SERVICES  
Address: 1102 STEWART ST.  
City: MADISON State: WI Zip: 53713  
Phone: 608-274-7600  
Email: \_\_\_\_\_Container Types: P = HDPE, PJ = HDPE Jar  
PY = Polypropylene, O = Other \_\_\_\_\_

Bottle Preservation Type:

TZ = Trizma: \_\_\_\_\_

Matrix Types: AQ = Aqueous, DW = Drinking Water, EF = Effluent, PP = Pulp/Paper, SD = Sediment,  
SL = Sludge, SO = Soil, WW = Wastewater, B = Blood/Serum, O = Other \_\_\_\_\_



159556

B510

SES # 508.02

P1 of 2

DC17  
°C

## CHAIN OF CUSTODY

Project ID: XGFG 18201

PO#:

Sampler:

Geoff Prior  
(name)

## For Laboratory Use Only

Work Order #: \_\_\_\_\_ Temp: 3.9/4.4 DC17  
Storage ID: \_\_\_\_\_ Storage Secured: Yes  No TAT Standard:  21 days

(check one): Rush (surcharge may apply)

 14 days  7 days Specify: \_\_\_\_\_

Relinquished by (printed name and signature)

Date

Time

Received by (printed name and signature)

Date Time

EPL 2/3/21 9:46

Relinquished by (printed name and signature)

Date

Time

Received by (printed name and signature)

Date Time

EPL 2/3/21 11:09

SHIP TO: Vista Analytical Laboratory  
1104 Windfield Way  
El Dorado Hills, CA 95762  
(916) 673-1520 \* Fax (916) 673-0106

Method of Shipment:

ATTN: \_\_\_\_\_

Tracking No.: \_\_\_\_\_

Add Analysis(es) Requested

Container(s)

PFAS by  
Isotope  
DilutionEPA Method  
537 (DW only)

Quantity

Type

Matrix

PFOA/PFOS

UCMR3 PFAS List:6

537.1 List: 14 or 18 (Circle One)

EPA Draft List of 24

OTHER:

Please attach analyte list

PFOA/PFOS

UCMR3 PFAS List:6

537.1 List of 14

537.1 List of 18

Comments

EPL 2/3/21

USE FORM MSDS 530671

530672

530673

530674

530675

530676

530677

530678

530679

Sample ID	Date	Time	Location/ Sample Description
B510, BES10, S1, 2'	2-1-21	1045	ADAL B510
ES10-1, S1, 2'	2-1-21	1045	ADAL B510
ES10-1, S3, 10'	2-1-21	1135	
E510-1, DUP		1125	
E510-2, S1, 2'		1155	
ES10-2, S3, 10'		1210	
ES10-3, S1, 2'		1230	
ES10-3, S3, 9 1/2'		1240	
ES10-3 ES10-3		1405	
ES10-1 ES10-1		1450	

Special Instructions/Comment

SEND  
DOCUMENTATION  
AND RESULTS TO:

Name: DUANE REICHEL  
 Company: SOILS & ENGINEERING SERVICES  
 Address: 1102 STEWART ST.  
 City: MADISON State: WI Zip: 53713  
 Phone: 608-274-7600  
 Email: \_\_\_\_\_

Container Types: P = HDPE, PJ = HDPE Jar  
PY = Polypropylene, O = OtherBottle Preservation Type:  
TZ = Trizma: \_\_\_\_\_Matrix Types: AQ = Aqueous, DW = Drinking Water, EF = Effluent, PP = Pulp/Paper, SD = Sediment,  
SL = Sludge, SO = Soil, WW = Wastewater, B = Blood/Serum, O = Other

# **APPENDIX C**

## Appendix C Contents

- *Important Information about This Geoenvironmental Report* advisory

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Burns & McDonnell  
F-35: ADAL B510 Warehouse & Supply  
Truax Air National Guard Base  
April 7, 2021

Project 508.02  
City of Madison  
Dane County, Wisconsin  
Report 03



Geotechnical Engineers since 1966

# Important Information about This Geoenvironmental Report

Geoenvironmental studies are commissioned to gain information about environmental conditions on and beneath the surface of a site. The more comprehensive the study, the more reliable the assessment is likely to be. But remember: Any such assessment is to a greater or lesser extent based on professional opinions about conditions that cannot be seen or tested. Accordingly, no matter how many data are developed, risks created by unanticipated conditions will always remain. *Have realistic expectations.* Work with your geoenvironmental consultant to manage known and unknown risks. Part of that process should already have been accomplished, through the risk allocation provisions you and your geoenvironmental professional discussed and included in your contract's general terms and conditions. This document is intended to explain some of the concepts that may be included in your agreement, and to pass along information and suggestions to help you manage your risk.

## Beware of Change; Keep Your Geoenvironmental Professional Advised

The design of a geoenvironmental study considers a variety of factors that are subject to change. Changes can undermine the applicability of a report's findings, conclusions, and recommendations. *Advise your geoenvironmental professional about any changes you become aware of.* Geoenvironmental professionals cannot accept responsibility or liability for problems that occur because a report fails to consider conditions that did not exist when the study was designed. Ask your geoenvironmental professional about the types of changes you should be particularly alert to. Some of the most common include:

- modification of the proposed development or ownership group,
- sale or other property transfer,
- replacement of or additions to the financing entity,

- amendment of existing regulations or introduction of new ones, or
- changes in the use or condition of adjacent property.

Should you become aware of any change, *do not rely on a geoenvironmental report.* Advise your geoenvironmental professional immediately; follow the professional's advice.

## Recognize the Impact of Time

A geoenvironmental professional's findings, recommendations, and conclusions cannot remain valid indefinitely. The more time that passes, the more likely it is that important latent changes will occur. *Do not rely on a geoenvironmental report if too much time has elapsed since it was completed.* Ask your environmental professional to define "too much time." In the case of Phase I Environmental Site Assessments (ESAs), for example, more than 180 days after submission is generally considered "too much."

## Prepare To Deal with Unanticipated Conditions

The findings, recommendations, and conclusions of a Phase I ESA report typically are based on a review of historical information, interviews, a site "walkover," and other forms of noninvasive research. When site subsurface conditions are not sampled in any way, the risk of unanticipated conditions is higher than it would otherwise be.

While borings, installation of monitoring wells, and similar invasive test methods can help reduce the risk of unanticipated conditions, *do not overvalue the effectiveness of testing.* Testing provides information about actual conditions only at the precise locations where samples are taken, and only when they are taken. Your geoenvironmental

professional has applied that specific information to develop a general opinion about environmental conditions. *Actual conditions in areas not sampled may differ (sometimes sharply) from those predicted in a report.* For example, a site may contain an unregistered underground storage tank that shows no surface trace of its existence. *Even conditions in areas that were tested can change*, sometimes suddenly, due to any number of events, not the least of which include occurrences at adjacent sites. Recognize, too, that *even some conditions in tested areas may go undiscovered*, because the tests or analytical methods used were designed to detect only those conditions assumed to exist.

Manage your risks by retaining your geoenvironmental professional to work with you as the project proceeds. Establish a contingency fund or other means to enable your geoenvironmental professional to respond rapidly, in order to limit the impact of unforeseen conditions. And to help prevent any misunderstanding, identify those empowered to authorize changes and the administrative procedures that should be followed.

### **Do Not Permit Any Other Party To Rely on the Report**

Geoenvironmental professionals design their studies and prepare their reports to meet the specific needs of the clients who retain them, in light of the risk management methods that the client and geoenvironmental professional agree to, and the statutory, regulatory, or other requirements that apply. The study designed for a developer may differ sharply from one designed for a lender, insurer, public agency...or even another developer. *Unless the report specifically states otherwise, it was developed for you and only you.* Do not unilaterally permit any other party to rely on it. The report and the study underlying it may not be adequate for another party's needs, and you could be held liable for shortcomings your geoenvironmental professional was powerless to prevent or anticipate. Inform your geoenvironmental professional when you know or expect that someone else—a third-party—will want to use or rely on the report. *Do not permit third-party use or reliance until you first confer with the geoenvironmental professional who prepared the report.* Additional testing, analysis, or study may be required and, in any event, appropriate terms and conditions should be agreed to so both you and your geoenvironmental professional are protected from third-party risks. *Any party who relies on a geoenvironmental report without the express written permission of the professional who prepared it and the client for whom it was prepared may be solely liable for any problems that arise.*

### **Avoid Misinterpretation of the Report**

Design professionals and other parties may want to rely on the report in developing plans and specifications. They need to be advised, in writing, that their needs may not have been considered when the study's scope was developed, and, even if their needs were considered, they might misinterpret geoenvironmental findings, conclusions, and recommendations. *Commission your geoenvironmental professional to explain pertinent elements of the report to others who are permitted to rely on it, and to review any plans, specifications or other instruments of professional service that incorporate any of the report's findings, conclusions, or recommendations.* Your geoenvironmental professional has the best understanding of the issues involved, including the fundamental assumptions that underpinned the study's scope.

### **Give Contractors Access to the Report**

Reduce the risk of delays, claims, and disputes by giving contractors access to the full report, *providing that it is accompanied by a letter of transmittal that can protect you* by making it unquestionably clear that: 1) the study was not conducted and the report was not prepared for purposes of bid development, and 2) the findings, conclusions, and recommendations included in the report are based on a variety of opinions, inferences, and assumptions and are subject to interpretation. Use the letter to also advise contractors to consult with your geoenvironmental professional to obtain clarifications, interpretations, and guidance (a fee may be required for this service), and that—in any event—they should conduct additional studies to obtain the specific type and extent of information each prefers for preparing a bid or cost estimate. Providing access to the full report, with the appropriate caveats, helps prevent formation of adversarial attitudes and claims of concealed or differing conditions. If a contractor elects to ignore the warnings and advice in the letter of transmittal, it would do so at its own risk. Your geoenvironmental professional should be able to help you prepare an effective letter.

## **Do Not Separate Documentation from the Report**

Geoenvironmental reports often include supplemental documentation, such as maps and copies of regulatory files, permits, registrations, citations, and correspondence with regulatory agencies. If subsurface explorations were performed, the report may contain final boring logs and copies of laboratory data. If remediation activities occurred on site, the report may include: copies of daily field reports; waste manifests; and information about the disturbance of subsurface materials, the type and thickness of any fill placed on site, and fill placement practices, among other types of documentation. *Do not separate supplemental documentation from the report. Do not, and do not permit any other party to redraw or modify any of the supplemental documentation for incorporation into other professionals' instruments of service.*

## **Understand the Role of Standards**

Unless they are incorporated into statutes or regulations, standard practices and standard guides developed by the American Society for Testing and Materials (ASTM) and other recognized standards-developing organizations (SDOs) are little more than aspirational methods agreed to by a consensus of a committee. The committees that develop standards may not comprise those best-qualified to establish methods and, no matter what, no standard method can possibly consider the infinite client- and project-specific variables that fly in the face of the theoretical “standard conditions” to which standard practices and standard guides apply. In fact, these variables can be so pronounced that geoenvironmental professionals who comply with every directive of an ASTM or other standard procedure could run afoul of local custom and practice, thus violating the standard of care. Accordingly, when geoenvironmental professionals indicate in their reports that they have performed a service “in general compliance” with one standard or another, it means they have applied professional judgement in creating and implementing a scope of service designed for the specific client and project involved, and which follows some of the general precepts laid out in the referenced standard. To the extent that a report indicates “general compliance” with a standard, you may wish to speak with your geoenvironmental professional to learn more about what was and was not done. *Do not assume a given standard was followed to the letter.* Research indicates that that seldom is the case.

## **Realize That Recommendations May Not Be Final**

The technical recommendations included in a geoenvironmental report are based on assumptions about actual conditions, and so are preliminary or tentative. Final recommendations can be prepared only by observing actual conditions as they are exposed. For that reason, you should retain the geoenvironmental professional of record to observe construction and/or remediation activities on site, to permit rapid response to unanticipated conditions. *The geoenvironmental professional who prepared the report cannot assume responsibility or liability for the report's recommendations if that professional is not retained to observe relevant site operations.*

## **Understand That Geotechnical Issues Have Not Been Addressed**

Unless geotechnical engineering was specifically included in the scope of professional service, a report is not likely to relate any findings, conclusions, or recommendations about the suitability of subsurface materials for construction purposes, especially when site remediation has been accomplished through the removal, replacement, encapsulation, or chemical treatment of on-site soils. The equipment, techniques, and testing used by geotechnical engineers differ markedly from those used by geoenvironmental professionals; their education, training, and experience are also significantly different. If you plan to build on the subject site, but have not yet had a geotechnical engineering study conducted, your geoenvironmental professional should be able to provide guidance about the next steps you should take. The same firm may provide the services you need.

## **Read Responsibility Provisions Closely**

Geoenvironmental studies cannot be exact; they are based on professional judgement and opinion. Nonetheless, some clients, contractors, and others assume geoenvironmental reports are or certainly should be unerringly precise. Such assumptions have created unrealistic expectations that have led to wholly unwarranted claims and disputes. To help prevent such problems, geoenvironmental professionals have developed a number of report provisions and contract terms that explain who is responsible for what, and how risks are to be allocated. Some people mistake these for “exculpatory clauses,” that is, provisions whose purpose is to transfer one party’s rightful responsibilities and liabilities to someone else. Read the responsibility provisions included in a report and in the contract you and your geoenvironmental professional agreed to. *Responsibility provisions are not “boilerplate.”* They are important.

## **Rely on Your Geoenvironmental Professional for Additional Assistance**

Membership in the Geoprofessional Business Association exposes geoenvironmental professionals to a wide array of risk management techniques that can be of genuine benefit for everyone involved with a geoenvironmental project. Confer with your GBA-member geoenvironmental professional for more information.



8811 Colesville Road/Suite G106, Silver Spring, MD 20910

Telephone: 301/565-2733 Facsimile: 301/589-2017

e-mail: [info@geoprofessional.org](mailto:info@geoprofessional.org) [www.geoprofessional.org](http://www.geoprofessional.org)

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**WISCONSIN AIR NATIONAL GUARD  
HEADQUARTERS 115<sup>TH</sup> FIGHTER WING (ACC) (ANG)  
3110 MITCHELL STREET  
MADISON WISCONSIN 53704-2529**

22 September 2021

**MEMORANDUM FOR WISCONSIN DEPARTMENT OF NATURAL RESOURCES**

**FROM:** 115 CES/CC

**SUBJECT:** XGFG182011 F-35 Addition/Alteration Building 510, Truax Field. Materials Management Plan Addendum – BRRTS #: 02-13-585319

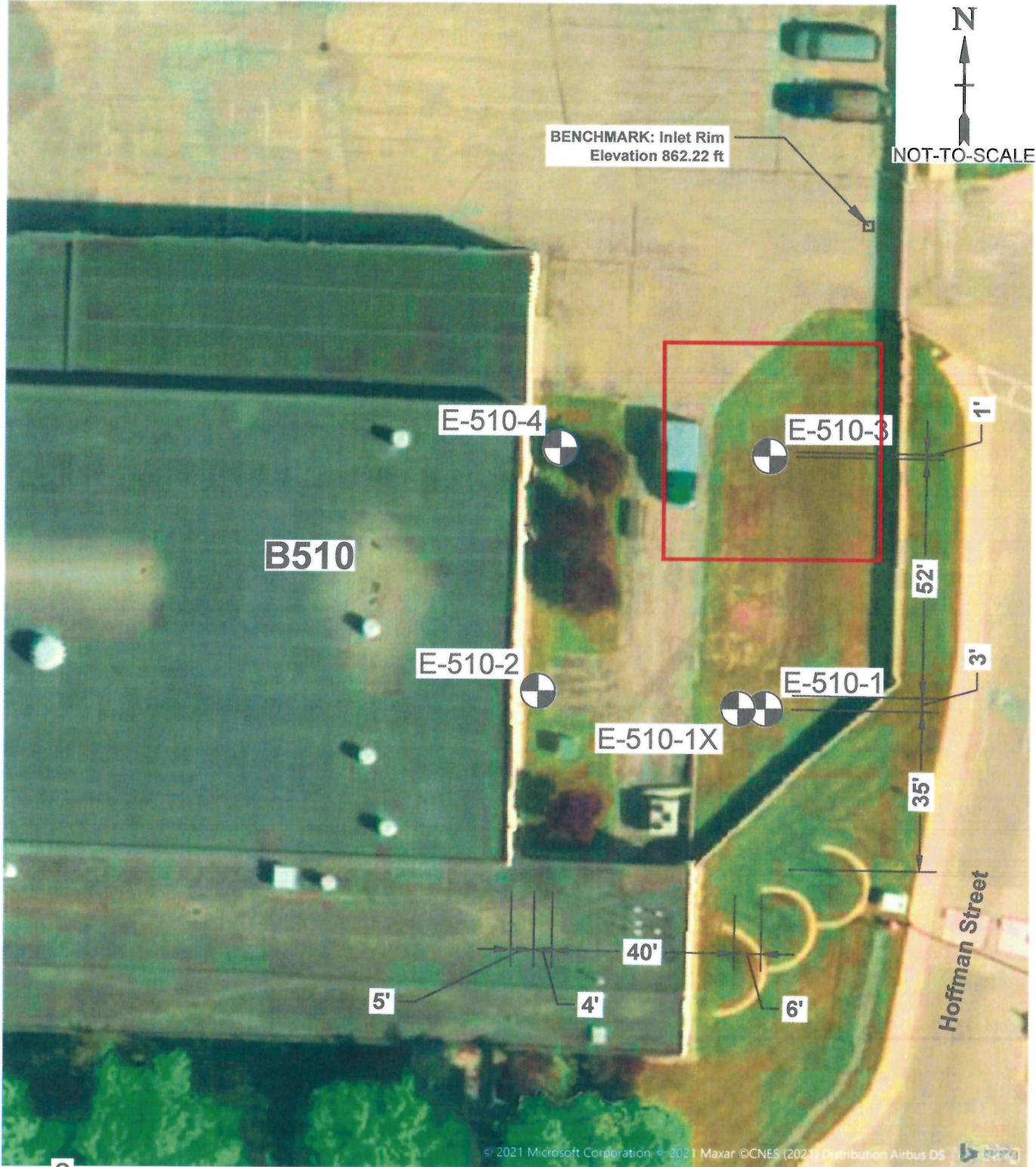
1. Pursuant to the 21 July 2021 approved materials management plan, this serves as a project specific addendum for the subject project.
2. Attachment 1 details PFAS sampling results for the subject project. Attachment 2 details the areas which were found to contain PFAS. For materials removed within the 50' x 50' red box associated with Sample Point E-510-3, only material from ground surface down to 2' will be managed as PFAS compromised soil. Materials removed within these boundaries (vertically and horizontally) will be managed in accordance with the 21 July 2021 letter, BRRTS #: 02-13-585319.
3. If you have any additional questions, please feel free to contact me at 608-286-0010 or [michael.dunlap@us.af.mil](mailto:michael.dunlap@us.af.mil) at any time. Thank you in advance for your review of this material management plan.

**DUNLAP.MICHAEL.J.1138452693** Digitally signed by  
DUNLAP.MICHAEL.J.1138452693 Date: 2021.09.22 07:28:54 -05'00'

MICHAEL J. DUNLAP, Lt Col, WI ANG  
Commander, 115th Civil Engineer Squadron  
Base Civil Engineer, 115th Fighter Wing

**Attachment:**

1. B510 Sampling Report Results
2. B510 Sampling Plan



LOCATION SKETCH  
F-35: ADAL B510 Warehouse and Supply  
Truax Air National Guard Base  
Hoffman Street  
City of Madison, Dane County, Wisconsin  
Project ID XGFG182011

DRAWING  
508-02-3B

B510 Soil sampling results - PFAS

Site	Analyte	CAS Number	Conc. (ng/g)	MDL	RL	Qualifiers	WI RCL NI (ng/g)	EPA RSL (ng/g)
E510-1,S1,2'	PFHxS	355-46-4	0.445	0.389	0.477	J,Q		
E510-3,S1,2'	PFHxS	355-46-4	1.11	0.398	0.487			
E510-4,S1,2'	PFBA	375-22-4	0.357	0.263	0.494	J		
E510-4,S1,2'	PFOS	1763-23-1	1.18	0.754	0.987	Q	1260	1260

RCL NI - Residual Contaminant Level - non-industrial

RSL - US EPA Regional Screening Level (AF guidance for soils and sediments)

MDL = Method Detection Limit

J = The amount detected is below the Reporting Limit/LOQ

RL = Reporting Limit

Q = The ion transition ratio is outside of the acceptance criteria.